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Vol. XCIX.



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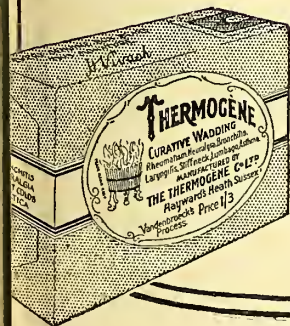
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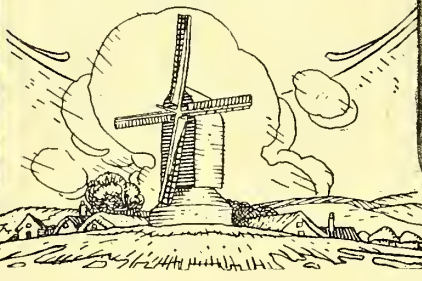
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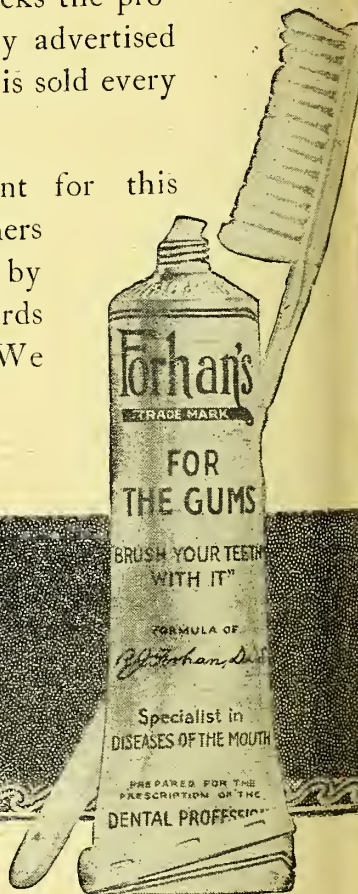
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Under the management of the *British and Colonial Pharmacist*, the Organisers of the series of highly successful Annual Chemists' Exhibitions, 1895-1923.

"The Pharmaceutical Journal" of September 1st said:—

"CHEMISTS' EXHIBITION IN GLASGOW.

"September 17—21.

"A landmark in the history of the retail trade in Scotland will shortly be made by the coming of the Chemists' Exhibition to Glasgow. It is well known that the *British and Colonial Pharmacist* has shown considerable enterprise in providing the calling with a museum and mart on twenty-five successive occasions. The venue, generally, has been London, but last year, northern chemists, especially, showed they were no longer content to let their more southern *confreres* have all the business education and trading advantages presented by these periodical expositions. And so a demand arose, first in Yorkshire, and subsequently in Scotland, for a trade display embracing all the specialised features and intimate professional organisation which have for many years characterised the annual metropolitan gathering. The Yorkshire demand was filled at Leeds to the complete satisfaction not only of the chemists of the Ridings, but of those of all the counties of the North of England. The Scottish call will be answered at St. Andrew's Hall, Glasgow, on September 17-21, and Scottish pharmacists will find it meets their best anticipations. The organising spirit of the Scotsman has stepped in on this occasion to supplement the efforts of the promoters. A list of patrons of the exhibition includes the following well-known pharmacists: James Anderson, Dundee; H. P. Arthur, Glasgow; John T. Coats, Edinburgh; C. E. Cockburn, Glasgow; Robert Dickson, Glasgow; P. M. Duff, Glasgow; J. J. Forbes, Perth; W. S. Glass, Edin-

burgh; James Grant, Glasgow; Thomas Guthrie, Clydebank; Thomas Harley, Perth; W. F. Hay, Aberdeen; J. Rutherford Hill, Edinburgh; Robert Hunter, Aberdeen; Robert Inglis, Paisley; James Jack, Arbroath; G. S. Kitchin, Glasgow; James Lennox, Glasgow; D. G. McKenzie, Glasgow; K. J. C. McLennan, Edinburgh; Thomas MacMaster, Partick; Anthony McMillan, Glasgow; Alexander McSween, Glasgow; J. B. McVitie, Glasgow; Martin Meldrum, Ayr; J. R. Milne, Dundee; Patrick Mitchell, Dumbarton; W. J. Moffat, Glasgow; W. W. Mollison, Glasgow; John Raffan, Stirling; Balfour Reekie, Hamilton; J. R. Reith, Culter, Aberdeenshire; D. W. Robb, Glasgow; J. Anderson Russell, Greenock; Charles Simpson, Aberdeen; Alexander Turner, Dumfries; John Weir, Clydebank. The opening ceremony will be performed on September 17, at 11 o'clock, by Mr. Anthony McMillan, Chairman of the N.B.B. Executive of the Pharmaceutical Society. Although primarily intended for the trade in Scotland, many Sassenachs will be found North of the Tweed during Chemists' Week in Glasgow. One such, writing for a ticket and railway rebate, observes: 'I may say in passing that I attended the London Exhibition and made purchases to the extent of nearly £300, most of which has been turned over and is ready for replacement either as a repeat order or as new stock. Personally, I am very interested in trade shows as a medium for obtaining new stock, fresh ideas, and for the opportunity afforded of meeting principals of firms with whom I am in the habit of doing business, but otherwise would not meet.'"

ALL RETAIL CHEMISTS in business on their own account who are subscribers to the "*British and Colonial Pharmacist*," or become subscribers on or before 15th inst. (Annual Subscription 10/6), are entitled to a rebate of half the Third Class Return Railway Fare from any station in Great Britain or Ireland to Glasgow on visiting the Exhibition, provided a claim for this rebate is made not later than the above-mentioned date. Rebates are paid in the Reception Room at the Exhibition.

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(8 lines)

R. W. Greeff & Co. Ltd.
THAMES HOUSE, QUEEN STREET PLACE, LONDON, E.C.4.

Tel. Add.
"Greeff, Cannon,
London."

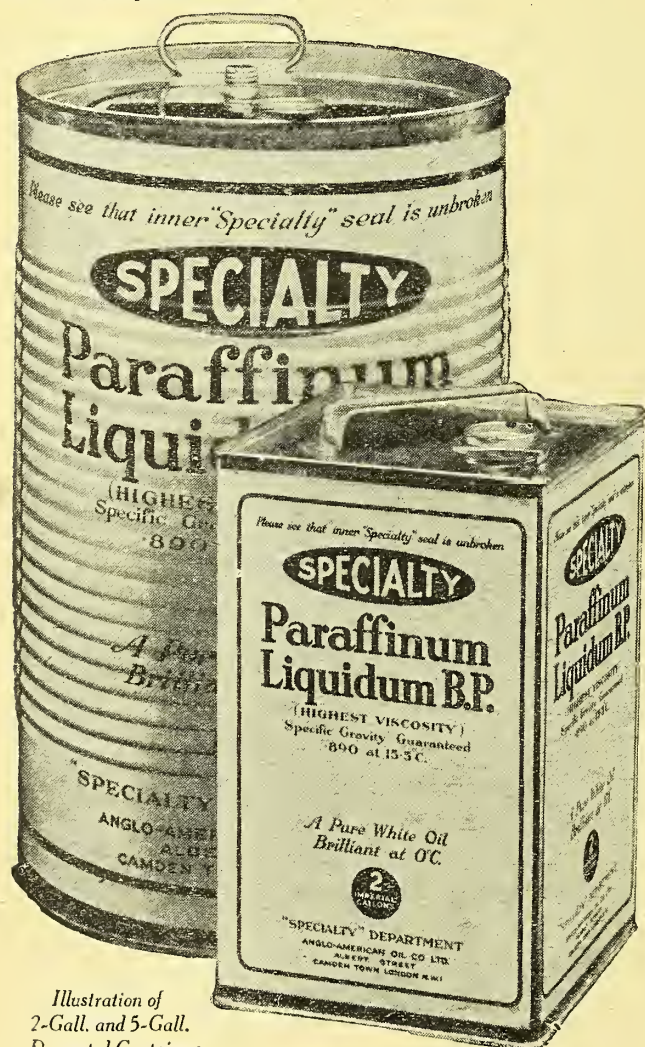
Branch Office

PALATINE BANK BUILDINGS, 10, NORFOLK ST MANCHESTER.
Tel. No City 5706/7. Tel. Add. Greeff, Manchester.

“SPECIALTY” ·890
Liquid Paraffin B.P.
A Pure White Oil
Brilliant at zero centigrade

Exceeds

B.P. Requirements.



*Illustration of
2-Gall. and 5-Gall.
Decorated Containers.*

We guarantee all supplies of "Specialty" Liquid Paraffin to be standard quality: This eliminates the disadvantages of a lower and varying gravity frequently found in non-guaranteed brands.

"Specialty" ·890 Liquid Paraffin never varies—is brilliant at zero centigrade and conforms to tests more rigid than those laid down in the British Pharmacopœia. For these reasons alone it is by far the most satisfactory to use.

Being the largest importers of White Oils we can quote keenest prices—another reason for using "Specialty" brand.

Samples and quotations—forwarded on request—will substantiate our claim.

**SOLD IN BULK
ONLY
in Free Containers.**

“Specialty” Dept.
ANGLO-AMERICAN
OIL COMPANY, LTD.
Albert Street, Camden Town,
London, N.W.1.

Telegrams :
 "Nufinfol-Norwest-London."

Telephone :
 Hampstead 4046 and 4047

Maw's



Page

Be prepared for the first cold snap.

THE first cold snap comes so suddenly that most people are unprepared, especially in the matter of Hot Water Bottles. It is as well to have your stock of Hot Water Bottles in readiness for the sudden demand, and your stock of course should be "PAREX" Hot Water Bottles.

First and foremost the "Parex" Hot Water Bottle is really superior to any other bottle at the same price. It is the bottle with the printed guarantee—a very valuable sales asset, and also it is the pharmacists very own brand "PAREX." Another substantial reason for selling only "Parex" Hot Water Bottles is that we lend you such valuable assistance in displaying them.

The screen illustrated here is a striking advertisement, which would bring a casual observer from the other side of the road to look in your window. It will sell "Parex" Hot Water Bottles most effectively. The leaflet illustrated is bright and colourful. It tells the whole story of "Parex" Hot Water Bottles, and is intended for counter distribution.

The "Parex" Hot Water Bottle screen and a supply of the leaflets will be sent with all orders to the value of £5 and upwards.



PRICES & QUANTITY TERMS.

"Parex" Grey—Improved Washerless Type.

Size.	Each.	Min. Retail.	Size.	Each.	Min. Retail.
6×8	3/9	5/-	8×10	4/8	6/6
6×10	4/2	5/6	8×12	5/3	7/-
7×12	4/11	6/9	8×14	5/10	7/6
10×12	6/-	8/-	12×14	7/5	9/9
10×14	6/8	8/9	12×14	8/4	10/6

"Parex" Super Red.

Size.	Each.	Min. Retail.	Size.	Each.	Min. Retail.
8×10	6/-	9/-	10×12	7/8	11/6
8×12	6/8	10/-	10×14	8/7	12/9
8×14	7/5	11/-			

£5 orders extra 5%.

The above minimum retail prices will be strictly maintained and goods sold conditionally that they are to be reserved for "Parex" Brands.

S. Maw, Son & Sons Ltd.
Aldersgate St., London.
and Barnet.



Telephone
City 7
Private
Branch
Exchange

Telegram
Eleven
Cent
London

Cables
Eleven
London

Code
A.B.C.
4th & 5th
Edition

Established 1768

ANTOINE CHIRIS

GRASSE

Will present in September

OIL OF LAVENDER

JASMIN

VANILLA BEANS

BOURBON

CROP
1923

AND

CONCRETE ORRIS

OIL OF SAGE

With a substantial reduction in prices

through

ANTOINE CHIRIS, Ltd.

3 Drapers Gardens, LONDON, E.C.2



Wholesale

12 doz. @			
11/3 doz.	£6	15	0
Discount 5% (off final invoice)		6	9
Total outlay	£6	8	3

Retail

12 doz. @			
1/3 each	£9	0	0
1 doz. Bonus		15	0
Receipts	9	15	0
Cost	6	8	3
PROFIT	£3	6	9

PASTILLE PRESENTATION SCREEN

This photograph represents the Decorated Window screen (4 ft. x 3 ft.) which we supply on request, with bonus of 13 to the dozen for guaranteed Window Displays for orders of 12 dozen and upwards, which may be taken in two deliveries. This order shows you a profit of 52% on outlay and the goods are widely advertised!

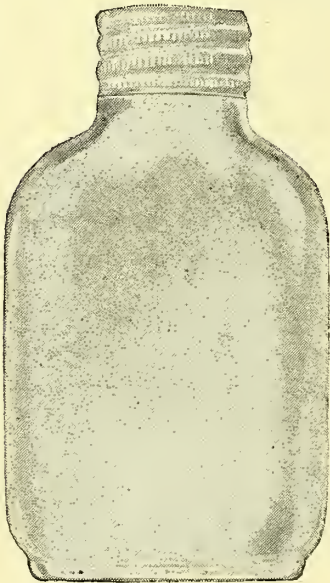
EVANS

EVANS SONS LESCHER & WEBB, LTD.

LIVERPOOLNew YorkLONDON



ACCURACY



Facsimile of No. 4 Tablet.

U.G.B. bottles meet the vital importance of accuracy in contents, corkage and graduations demanded by the discriminating dispenser.

Aside from the regular line of dispensing flats, etc., we draw your attention to an achievement:—

“The U.G.B. Tablet”

OWEN'S AUTOMATIC MACHINE MADE.

THE FIRST OF ITS KIND OFFERED. ALL THE CAPS FIT! A STRONG SOUND TABLET. STANDING ON AN EVEN BASE.

EVERY FEATURE that a pocket TABLET should embody—but heretofore has not.

You may place orders for U.G.B. Bottles of all kinds with the greatest confidence.

IF ANY DIFFICULTY IS EXPERIENCED IN SECURING SUPPLIES FROM YOUR WHOLESALER, KINDLY COMMUNICATE WITH

UNITED GLASS BOTTLE
MANUFACTURERS • LIMITED

Comprising—

Cannington, Shaw & Co., Ltd.; Nuttall & Co. (St. Helens) Ltd.;
Robert Candlish & Son, Ltd.; Alfred Alexander & Co., Ltd.;
E. Bressit & Co., Ltd.; United Glass Bottle Mfrs. (Charlton) Ltd.

Head Office:

40/43 NORFOLK STREET, STRAND, W.C.2.

Works:

Charlton - - London.
Castleford - - Yorks.
St. Helens - - Lancs.
Hunslet - - Leeds.
Seaham Harbour, Durham.

Telephone:—
Central 8080 — 8089
(10 lines).

Telegrams:—
“Unglaboman, Estrand,
London.”

You are safe!

in booking

CONTRACTS

with

AYRTON, SAUNDERS & CO., LTD.

Safe Products 

Safe Terms——with a
comprehensive falling clause.

Effective Sales Pro-
ducing display matter.

ASK PRICES FOR YOUR QUANTITIES OF:—

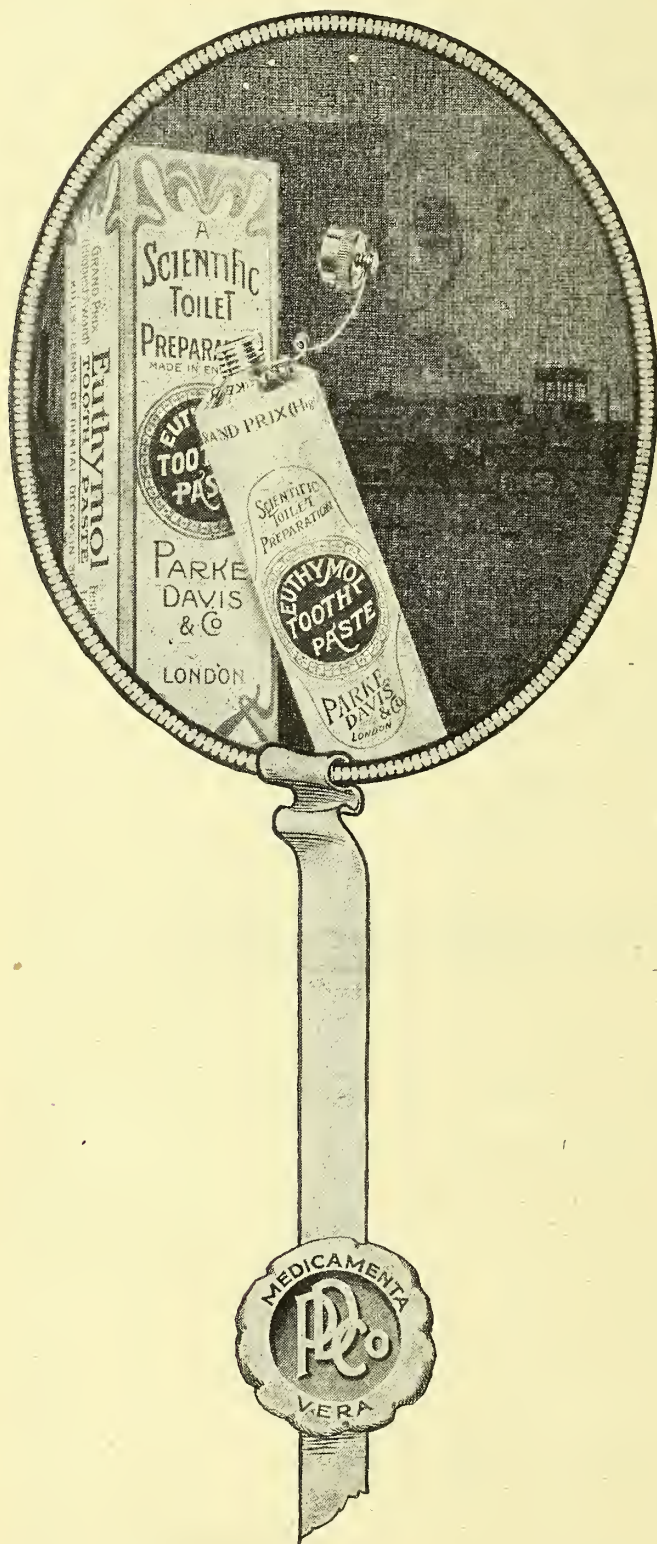
COD LIVER OIL
CREAM EMULSION OF C.L.O.
MALT EXTRACT
MALT EXTRACT WITH C.L.O.
VITAMINE MALT
COUGH MIXTURES

IN BULK OR PACKED.

34 Hanover Street,

Telegrams: "Sundries, Liverpool."
Telephone: Royal 4861.

LIVERPOOL.

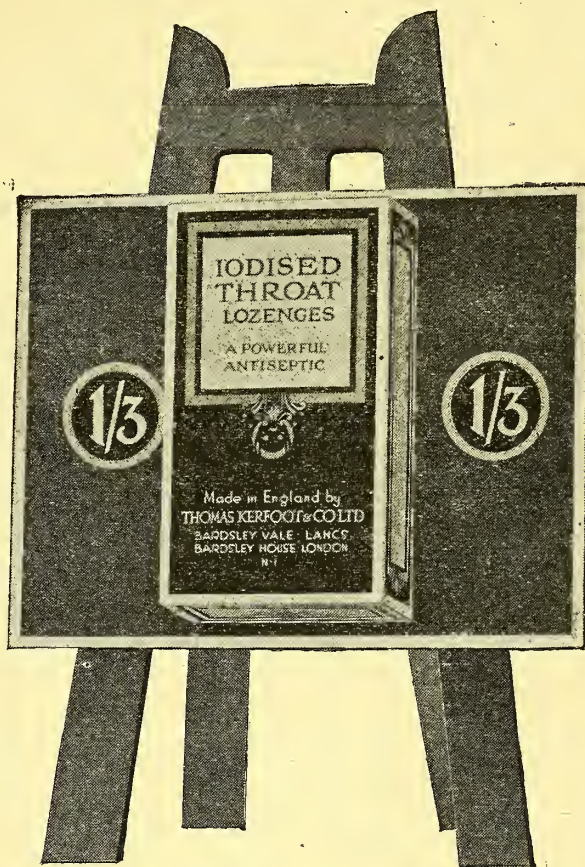


Sell more
Euthymol
TOOTH PASTE

It pays!

Write for terms.

Parke, Davis & Co.
50-54, Beak Street, London, W.1.



*This Novel
Counter Easel
is free with
all supplies of*

THE KERFOOT SERIES OF PACKED LOZENGES

**BISMUTHATED MAGNESIA :: FORMALIN & CINNAMON
FORMALIN & ROSE :: FORMALIN & MINT :: IODISED THROAT**

EXCLUSIVE amber bottle—a carton design of great distinction—different colour scheme for each title—Hand-made Lozenges of Kerfoot quality—and this novel Easel as a selling aid.

PRICES (One kind or assorted) : Gross, 8/3 doz. Half-Gross, 8/6 doz. Less, 9/- doz.

THOMAS KERFOOT & CO LTD
BARDSLEY VALE, LANCASHIRE,
& Bardsley House, London, N.1
ESTABLISHED 1797.

COPYRIGHT

Beaverpuf

Series

Mousley's Patents.

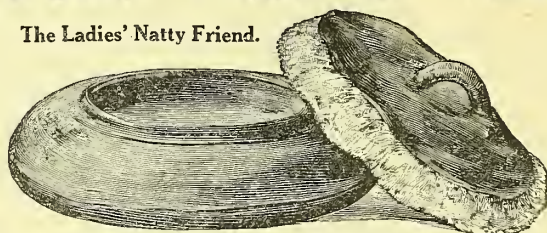
A "Beaverpuf" in your window means extra profits, it means satisfied customers and a bigger turnover, it means possibly more than you imagine.

Our new method of sealing obviates soiled stock and carries our guarantee right into your customer's hands.

The Powder Puff of Distinction

Refills in Rachel,
Naturelle, Rose,
Sunburn, Blanche
and Rouge
6d. and 1/- each.

The Ladies' Natty Friend.



Prices from 4/-
to 21/- each.

Every Puff
guaranteed.

LARGEST SALE OF ANY POWDER PUFF IN THE WORLD

Ask for a Beaverpuf with either Lambswool, White or Brown Fur Puff.

Write for illustrated booklet and lists—

"BEAVERPUF," Ltd., Priest Bridge, London, S.W.14

Sole Concessionnaires for Great Britain and Ireland.

'Phone: PUTNEY 166.

You can always sell these preparations

Melba Toilet Preparations are so beautifully packed that they would sell on sight for this reason alone. But the contents of these delightful packages are pure and create beauty in the most magical way.

Melba Toilet Preparations are well and extensively advertised. The demand is being created and splendid chemist-help is given in the way of artistic showcards and window-display material.

Write for Trade Terms and Full Particulars.

Sole Consignees: **A. CONNELL & CO. (Dept. CD)**
MELBA HOUSE, WENLOCK RD., LONDON, N.1

Telephone: Clerkenwell 7266.

MELBA

TOILET PREPARATIONS

Lines that show good profits



Taylor's CIMOLITE PREPARATIONS

50 YEARS' REPUTATION.

Used in all Royal Nurseries and by the Nobility.

CIMOLITE TOILET POWDER.

Boxes, 1/1½ (per doz. 9/6)
Tins, 3/-, 5/6, 11/- (per doz. 27/-, 49/3, 96/-)
Bottles, 3/3, 6/6 (per doz. 30/-, 55/6)

CIMOLITE TOILET CREAM.

Collapsible tubes, 1/3 (per doz. 11/6)

CIMOLITE SOAP.

Per tablet, 8d.; per box 2/- (per doz. 3 tab. boxes, 20/-)

CIMOLITE FACE POWDER.

Boxes, 1/1½ (per doz. 9/6)
Tins, 3/- (per doz. 27/-)

CIMOLITE SOAP (Violet-Scented)

Per tablet, 8d.; per box, 2/- (per doz. 3-tab. boxes, 20/-)

CIMOLITE SHAVING SOAP.

Sticks, 1/3 (per doz., 11/6)

SHOWCARDS and Counter
Bills on application.

NOW
ON
THE
P.A.T.A.



Cimolite Preparations are stocked by all wholesale houses.

ATTRACTIVE SHOW CARD obtainable from all wholesalers or direct.

PREPARED ONLY BY

JOHN TAYLOR, Manufacturing Chemist
30 BAKER STREET, PORTMAN SQ., LONDON, W.1

HOVENDEN'S SPECIAL LINES

EAU DE COLOGNE



- No. 4843 1 oz. size **8/6** doz.
3 doz. lots **8/3** doz.
- „ 4844 2 oz. size **16/6** doz.
3 doz. lots **16/-** doz.
- „ 4845 4 oz. size **31/-** doz.
3 doz. lots **30/-** doz.
- „ 4846 6 oz. size **52/-** doz.
3 doz. lots **48/-** doz.

Also put up in watch shape bottles. 1 doz. on card.
4/3 doz. 6 doz. **4/-**

LAVENDER WATER

- No. 4847 $\frac{1}{2}$ oz. size **8/9** doz.
3 doz. lots **8/6** doz.
- „ 4848 1 oz. size **12/6** doz.
3 doz. lots **12/-** doz.
- „ 4849 2 oz. size **21/-** doz.
3 doz. lots **20/-** doz.



Send for sample $\frac{1}{2}$ doz. of each and be convinced of the quality.

R. HOVENDEN & SONS, LTD., LONDON

29, 30, 31, 32 and 33 BERNERS ST., OXFORD ST., W.1 and 89, 91, 93 and 95 CITY ROAD, FINSBURY, E.C.1.

Tel.: Clerkenwell 1260 (2 lines). Factory: 41 to 53 BRITANNIA ROW, ISLINGTON, N.1. Tel.: Museum 2810 (3 lines).

DEARBORN (1923) LTD.

37 Gray's Inn Road,
LONDON, W.C.1.

Toilet Specialties.

	Price per doz. to Retailer	Selling Price P.A.T.A.
PILENTA SOAP ... A complexion soap.	10/-	1/-
PROLACTUM ... For the lips.	10/-	1/-
PARSIDIUM JELLY ... For wrinkles.	10/-	1/-
ALLACITE OF ORANGE BLOSSOM ...	22/6	2/6
A dressing cream.		
BORANIUM ...	22/6	2/6
A hair tonic.		
CLEMINITE ...	22/6	2/6
For a face lotion.		
COLLIANDUM ...	22/6	2/6
For a face tint.		
PERGOL ...	22/6	2/6
A deodorant.		
TEKKO PASTE ...	22/6	2/6
Camphor cream.		
STALLAX ...	22/6	2/6
For a shampoo.		
JETTALINE ...	31/6	3/6
For clearing the skin.		
PHEMINOL ...	36/-	4/-
A depilatory.		
MENNALINE ...	36/-	4/-
For the eyelashes.		
MERCOLIZED WAX ...	31/6	3/6
A face cream.		
STYMOL ...	36/-	4/-
For oily complexions and blackheads.		
SILMERINE ...	22/6	2/6
Hair-curling fluid.		
BARSYDE ...	22/6	2/6
Dandruff eradicator.		
TAMMALITE ...	22/6	2/6
For grey and faded hair.		
LIQUID PERGOL ...	31/6	3/6
To check excessive perspiration locally.		
BICROLIUM ...	22/6	2/6
For whitening the hands.		
HARAPOSA ...	22/6	2/6
Nut oil shampoo.		
COCONOIDS ...	31/6	3/6
For figure development.		

The Products of

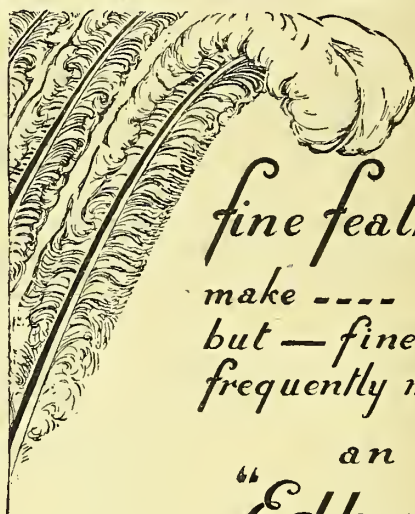
Messrs. PARKER, BELMONT & CO.

CLYNOL BERRIES	{ 36/-	4/-
For obesity.	58/6	6/6
SOFT PALERIUM...	45/-	5/-
For wrinkles.		
LIQUID NAIL POLISH ...	10/-	1/-
Brilliant and lasting.		

Stocked by ALL Wholesale Houses.

COLONIAL DEPÔTS AND AGENCIES.

Australia: ALL WHOLESALE, & DEARBORN (Australia), Ltd., Grace House, Clarence Street, Sydney.
South Africa: LENNON Ltd., Cape Town, etc.
SIVE BROS. & KARNOVSKY, Johannesburg.
India: FRAMJEE & SON, Bombay.
SMITH, STANISTREET & CO., Calcutta.
New Zealand: SHARLAND & CO., Auckland & Wellington.
South America: DEARBORN (South America) Ltd., Calla Salta 264, Buenos Aires.
Straits Settlements & Federated Malay States: MEDICAL HALL, Ltd., Singapore.



fine feathers
make -----
but — fine birds
frequently moult!

an
"Edbro"
Shaving brush
cannot moult!

It's fine hairs are
guaranteed anthrax
free and permanently
secured by a patent
process.

It is British made—
of the finest quality
materials, and is the
result of Seventy
Years' experience in
the making of Good
Brushes.

The "EDBRO" is
the brush with the
individual guarantee.



EDWARDS BROS.

SPECIALISTS IN THE MANUFACTURE
OF HIGH-CLASS TOOTH & SHAVING
BRUSHES. ————— Enquiries Solicited.

63 ST. PAUL'S ROAD
LONDON - - - N.1

Telephone

DALSTON 1311.

Don't Lose Your Rightful Profits

NOW is the time to ensure your profits by putting NUCTONE on display and making sure you have sufficient stock to meet the certain demand.

* * *

Thousands of pounds are now being spent on advertising NUCTONE. This sum may justly be regarded as an investment that cannot fail to bring you in a good return.

* * *

Take advantage of this NUCTONE advertising from the very start. An immediate display means immediate sales. Don't miss the profits that are rightly yours.

* * *

Remember that NUCTONE gives you a double advantage, first by the substantial profit on each individual sale, and second because you are protected by the NUCTONE guarantee under which you can recommend NUCTONE with perfect confidence to your grey-haired customers, certain that they will be entirely satisfied.

Showcards and explanatory booklets for free distribution are furnished free on request.

GUARANTEE

The Manufacturers guarantee that NUCTONE is absolutely free from any combination of lead and sulphur, and contains no ingredients that can possibly injure the hair. NUCTONE can therefore be recommended with entire confidence to your customers.

Nuctone

for GREY HAIR

Retail Price 6/6 per bottle
Price to you 52/- per doz.

In three grades:

NUCTONE for medium and dark hair.
NUCTONE ECLAIRE for fair & auburn shades.
NUCTONE CONCENTRE for Gentlemen's Hair.

Wholesale Distributors:

HENRY C. QUELCH & CO.
4-5 Ludgate Square, London, E.C.4

Manufactured by
STEWART, GOODALL & DUNLOP, LIMITED,
4 Dering Street - - - - - London, W.1

Before ordering your
Christmas stocks of

EAU DE COLOGNES AND LAVENDER WATERS

we advise you to write us for particulars of our new Watch-shape flask series, in $\frac{1}{2}$ oz., 1 oz., and 2 oz. sizes.

They are admitted by large numbers of our customers to be the smartest and, for their quality, the cheapest lines on the market.

THEY SELL AT SIGHT AND BRING REPEAT ORDERS

They mean good profits for you and good value for the customer.

We are now booking orders for delivery in October.

Write for prices and full particulars to:

SPURWAY ET CIE, LTD.

89 Great Eastern Street
LONDON, E.C.

CANNES-GRASSE
PARIS

NEW YORK
LEIPSIK



It pays to display—shows attractive profits

The special bonus offer in addition to attractive profits makes ENOLIN a line well worth featuring in your window. The public recognise ENOLIN as a tooth paste of quality. Where it is

shown in conjunction with ENOLIN showcards the effect of our past and present advertising begins to show its value to you by increasing sales—It pays to display.

Sole Manufacturers of Enolin Tooth Paste
**ENOLIN LTD., 201 King Street,
 Hammersmith - London, W.6.**

PHONE: HAMMERSMITH 1605.

Enolin

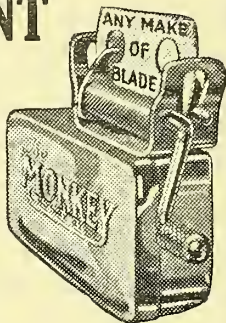
33 1/3 PER CENT

and the appreciation of
 your customers.

THAT IS WHAT THE
MONKEY STROP
 OFFERS YOU.

Samples at doz. rate. Special offer,
 6 strops with show stand, 21/- c.w.o.
 De Luxe Model, Retail 5/6, 45/- doz.

ORDER THROUGH WHOLESALE,
 Wholesale & Export Enquiries invited,
DOUGLAS KIRBY & CO.,
 Eastgate House, Gloucester, Eng.



G. B. KENT & SONS, LTD.

Are known the World over as
 the Largest Manufacturers of

BEST BRITISH BRUSHES

Please write for full Particulars to—

75 Farringdon Road, E.C.1.

PRICE'S OLD ENGLISH LAVENDER SOAP

The
Goods



This exceedingly popular Toilet
 Soap is put up in the three
 following sizes :—

VISITORS in 12-cake boxes **14/9**
 per gross.

ORIGINAL TOILET SIZE

In 6-cake boxes **41/3** per gross.

In 12-cake boxes **39/9** per gross.

BATH SIZE 64/- per gross in
 6-cake boxes.

All the above are packed in the
 neat, familiar wooden boxes.

N.B. We have specially reserved
 for Chemists an uncoloured Old
 English Lavender Soap, Toilet size,
 at the same prices as above indicated.

Terms and samples on application.

Price's Soap Co. Ltd.
LONDON

The 'ESSENFLOUR PRODUCTS Ltd.'

*Distillers of Essential Oils and
Manufacturers of Perfumery Products*

MYSORE - - S. India

have been appointed as from the 1st Sept.,
1923, Sole Consignees and Distributors of

MYSORE GOVT. SANDALWOOD OIL

Satisfying all pharmacopœia and possessing an excellent aroma.

*Samples and prices will be readily supplied
on application to our correspondent at*

'PERFUME HOUSE,' 6-8 Beauchamp Street, London, E.C.1

Telephone : HOLBORN 2499.

Telegrams : "EKDUM LONDON."

ESSENCES

HIGHEST CONCENTRATION.

Sole Agents for Gt. Britain and Colonies
FOR

FRIES & BRO. NEW YORK

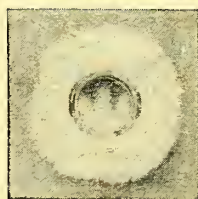
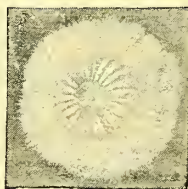
The World - Renowned Makers of
FIRST QUALITY ESSENCES.

Stocks in London. **PEACH
APRICOT
HONEY
MAPLE** Ask for Quotations & Samples.
&c.

A. CONNELL & CO.,

20 BEVIS MARKS, LONDON, E.C.3.

Phone : AVENUE 1945. Telegrams : "NITROZONE, LONDON."



POWDER PUFFS

GO TO THE FIRM
THAT
MAKES THEM.

WILLIAMSON BROS.

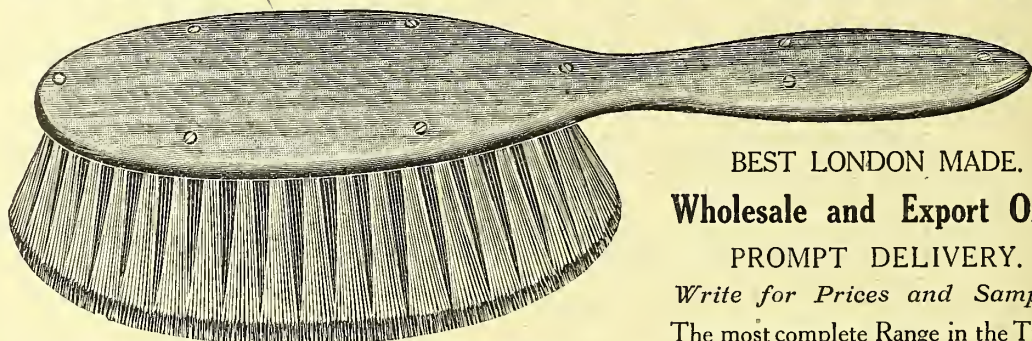


126
Southwark
Street,
London,
S.E.1

Phone:
HO? 3419



WHALEBONE HAIR BRUSHES



Also Polished Horn, Pin Bone (Extra Fine Whalebone)

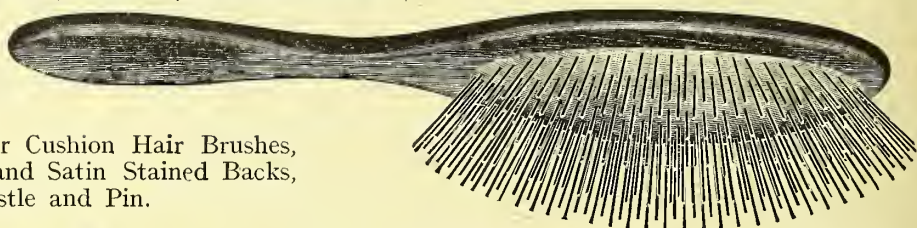
BEST LONDON MADE.

Wholesale and Export Only.

PROMPT DELIVERY.

Write for Prices and Samples.

The most complete Range in the Trade.



Rubber Cushion Hair Brushes,
Rose and Satin Stained Backs,
in Bristle and Pin.

JOHN FREEMAN, 10 Moor Lane, LONDON, E.C.2
Wholesale Brush Manufacturer & Importer. Telephone: London Wall 1656. Factory: WALTHAMSTOW

"Newberys"
FRANCIS NEWBERRY & SONS LTD

A FEW SPECIALS

HAIR BRUSHES

PURE BRISTLE, HIGH CUT,
STIFF UNBLEACHED, SCREWED BACKS

11 Rows × 1½ inches, per dozen	...	90/-
15 Rows × 1⅛ " " "	...	132/-

Aluminium Drinking Cups

6d. ...	Per dozen	3/9
1/3 ...	" "	10/-

COMBS, DRESSING

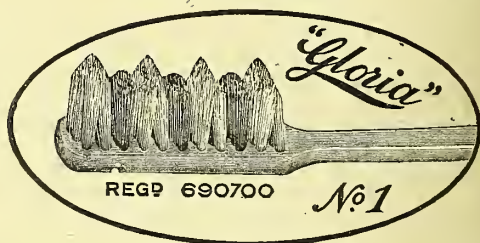
SPECIAL PRICES.

6-inch Gent.'s Taper, No. F. 27	...	Doz.	3/9
7¼ " " Stout Back, No. 22	"	"	4/6
6⅝ " " Roach Back, No. 5238	"	"	6/6
7 " " Roach Back, No. 21	"	"	7/6

All White Celluloid

FRANCIS NEWBERRY & SONS, LTD.
LONDON CARDIFF LIVERPOOL

BIDWELLS
NEW DESIGN.



ADVANTAGES :

Used up and down on the teeth it cleans in between them, and if pressed down hard the bristle will not crush.

Short knots in extra hard white, yellow or black bristle, long knots always white. Ventilating holes in back and hole in handle for hanging up. Sterilised and sealed in transparent Carton.

PRICE 17/- dozen ; 19/- Hard.
MINIMUM RETAIL 2/3 each ; 2/6 each.

Castle Mills, Axminster, Devon.

Good Summer Lines

"DURAPEDE"

A liquid application for tender and hot feet. No bathing necessary. It is applied to the feet with a sponge night and morning.

4-oz. bottles - - - 7/9 per doz.
10 " " - - - 14/6 " "

Name and Address printed free on 3 dozen lots. Showcards supplied.

LAURENCE'S ANTI-STING

A wonderful preventative against and a certain remedy for the Stings of Wasps, Bees, Mosquitoes, Gnats, Midges, &c.

AS A PREVENTATIVE.—Paint the exposed part of the body. AS A REMEDY.—Apply one drop to the part affected, and renew at intervals until relief is obtained. Packed in bottles, each in a distinctive carton.

Price 5/9 per dozen.

*SPECIAL POCKET SIZE, 4/6 per dozen.
Samples on Application.*

C. R. HARKER, STAGG & MORGAN, LTD.

DEVON WHARF AND BELL WHARF,

EMMOTT STREET, MILE END, LONDON E. 1.

**GET
THE
BEST**

SPONGES

AT

RIGHT PRICES

Write for Samples.

The SPONGE FISHING & IMPORTING CO. Ltd.

25 FINSBURY STREET, CHISWELL STREET, LONDON, E.C.2.

Buying Branches at Sfax, Tripoli, Kalymnos-Symi, Hydra, Batano, Nassau & Florida.

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Phone: CLERKENWELL 5425.

No Connection with any other firm.

Glaxo—the money maker

39 per cent. on your cost or 20 and 10 per cent. off the advertised price! This is what you can make when you buy Glaxo in £12 lots and give a 10 day's window show.

The *Daily Mail* six insertions in September with other advertisements in the *Evening News*, *Daily News*, *Daily Chronicle*, *Daily Mirror*, *Daily Sketch*, *Times* and many provincial papers—together with our representatives calling on doctors, and our following up birth notices—are all helping to make sales of Glaxo.

Why not sell Glaxo, not only for baby, but for the expectant and nursing mother, the growing child, and the invalid who has been ordered, but cannot digest, ordinary cow's milk? Will you not send an order and give Glaxo a display and attract this trade to your pharmacy?

Glaxo

The Money Maker
"Builds Bonnie Babies"

**SPECIAL PARCEL BOUGHT ON
ADVERTISING DISPLAY TERMS**
Great Britain Only

Parcel contains	Costs you	Yields	Total Profit
	£ s. d.	£ s. d.	£ s. d.
2 doz. 1/6 Glaxo	1 6 0	1 16 0	10 0
2 " 2/6 "	2 3 2	3 0 0	16 10
2 " 4/6 "	3 17 10	5 8 0	1 10 2
1 1/2 " 7/6 "	4 17 3	6 15 0	1 17 9
Total ...	£12 4 3	£16 19 0	£4 14 9

GLAXO (Sales Dept.), 56 Osnaurgh St., London, N.W.1

Astounding Offer of EXTRACT OF MALT and COD LIVER OIL 15% B.P.C.

Guaranteed Pure Malt Extract with
Finest Norwegian Cod Liver Oil.

1 lb. size Jars	9/6 per doz.	} Carriage paid.
2 lb. " "	16/10 " "	
4 lb. " "	32/- " "	

Super Quality at lowest prices.

Name and Address on 6 doz. assorted sizes.
Large choice of Artistic Litho Labels.

Contracts to end of March 1924 or forward orders placed now receive a bonus of 5%.

Write at once to

PRIMO DRUG CO., LTD.

Manufacturing Chemists
(Specialists in Malt and Oil),
5 Bury New Road,
MANCHESTER

'Phone: CITY 2435.

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for
MOTHER
and
BABY"



"DORSELL'S"
MILK FOOD

Equals Grade "A" Milk

5 oz., 10 oz. and 16 oz. net. Decorated air-tight tins.
Retail Price .. 1/4, 2/- and 2/6.

2 oz. Samples free.

Liberal trade discount. Bulk in 56-lb. tins, 2 tins in crate, rail paid, at 112/- per cwt.

Manufactured by

PRIDEAUX'S FOOD ETC. COMPANY, LIMITED,
Pioneers of the Dried Milk Industry. Eight
Creameries in Dorset, Somerset and Wilts.

London Office: 16 Southwark Street, S.E.1.

Send for Trade Terms and full particulars to:

PRIDEAUX'S FOOD etc. Co. Ltd.
MOTCOMBE, DORSET.

The Key of Life

REGISTERED TRADE-MARK No. 432225.

A Few Reasons Why Your
Customers Ask You For

Bovo-Lactin

Perfect
Concentrated Foods

- Because** Doctors are prescribing them to their patients in steadily increasing numbers in response to a vigorous campaign in the Medical Press.
- Because** In cases of acute illness they have demonstrated their efficiency.
- Because** In convalescence they have proved themselves to be of paramount importance in daily dietary.
- Because** They insure health in body, brain and spirits.
- Because** Children thrive on them.

Your Profit **33 $\frac{1}{3}$ %** on Selling Price

Invalid Bovo-Lactin	..	..	..	3/9 P.A.T.A.	30/-	per doz.
Bovo-Lactin Essence	..	..	..	3/9	30/-	"
Bovo-Lactin Chocolate	..	..	..	3/6	28/-	"

Any further details regarding these preparations
will be gladly furnished on receipt of Post Card.

FOOD PRODUCTS, Ltd.

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Laboratory and Works - - Twickenham, England

Sole Distributing Agents for the United Kingdom and Ireland :

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Foreign Agency enquiries are invited.



THE
BRITISH DIAMALT CO.'S

Products are Reliable

MALT EXT. & C.L.O.

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THE BRITISH DIAMALT COMPANY

Maltsters and Malt Extract Makers.

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Works & Laboratories: SAWBRIDGEWORTH, HERTS.

Liverpool Office: ARCADE BUILDINGS, 85 LORD STREET.

Vinum Xericum

BUTTS. 108 galls.	HOGSHEADS. 54 galls.	QR. CASKS. 27 galls.
Grade A. STRENGTH 16.5°—17° Abs. Alc.		
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James V. Oldham

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MAJAX

The ideal milk sugar for babies. We are having direct orders from all parts of the country. Why not participate in this business?

For terms write to Proprietors

MAWSON & PROCTOR, LTD.
NEWCASTLE-ON-TYNE.

QUALITY MAKERS of

Malt Ext. and

All packings.

Malt & Oil

C. Tolkien & Co.

Established 1886.

Factory & Maltings—Apollo Works,
Offices & Warehouse—Commercial Mills, Blackburn.

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Milkal is
all Milk
AND ONLY
MILK



FOR
BABY



FOR BABY'S
MOTHER



FOR GROWING
CHILDREN



FOR THE
SICK ROOM



FOR
INVALIDS

MILKAL is just milk—rich fresh Devonshire milk—from which the water has been extracted. When you add cold water to it you reverse the process—Milkal is milk again. It looks like milk, smells like milk, and tastes like milk; naturally, because it is milk. But it has this difference—it is absolutely, definitely clean.

MILKAL
THE CLEAN MILK

Milkal is described as "Dried Milk"—a term that covers a multitude of imitations: but it is the only dried milk that, mixed with water, tastes like cows' milk.

A Most Profitable Line for you to Handle.

Dried Milk meets an urgent need in every household. Milkal is the most economical and convenient method of providing clean milk at any hour of the day or night. You sell Milkal by the pound or half-pound tin, and your liberal margin of profit is indicated as follows:

		Wholesale		Retail
1-lb. size	=	2/9½	=	3/6
½-lb. size	=	1/5	=	1/9½

Stock taken back and Cash refunded at any time.

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Produced and packed in Devon (England) by MILKAL, Ltd., London and Devonshire.


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VIN-SANGUIS
WINE FOR THE BLOOD

Fountain of Health

If you have a Wine License we will pay the fee.
If not, get one, we will pay.

You agree to display "Vin Sanguis" always.
You give us an agreed initial order.
You always keep stock.

Send for any further particulars



PROPRIETORS OF
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Telegrams :
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ESTABLISHED 1855.

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"Lifos" Tonic Blood Wine

English Port Style

**British and Foreign
Wines of all varieties**
Bottles and Casks.

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WRITE US TO-DAY AND COMPARE OUR PRICES.

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DELIVERED FROM STOCK.

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Prepared in strict accordance with the Formula of the British Pharmacopœia.

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Samples from Head Office, Thomas Street, DUBLIN, or London Office, 74 Great Tower Street, LONDON, E.C.3.

Reduction of Prices from Sept. 1st

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to Chemists
without Licenses**

It has been established by law that Registered Chemists may sell Wincarnis with Quinine without a License.

WINGARNIS

**Sells readily ALL
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Large Size **5/-**

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A SURE SELLER

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COD LIVER OIL, COD LIVER OIL EMULSION

EXTRACT OF MALT

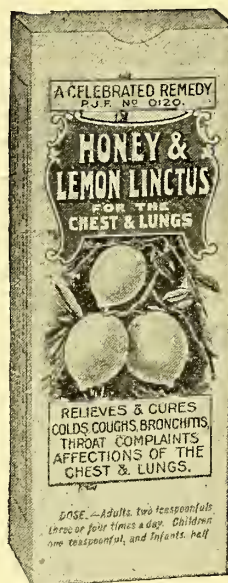
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(with or without
Cod Liver Oil)

EXTRACT

1923-4



**CUT
PRICES**

are sending the
Contracts to
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WHEN we make a special bid for business we usually get it, and this year we are out for the Malt Extract trade. And it is coming our way to a greater extent than ever before—we appear to be getting it in every case in which our pack and our price are compared with other offers.

Faultless is the only word which describes our complete Malt Extract offer of this year. It includes the highest-grade extract, rich in pure Oil, perfect jars of either round or the popular oval shape, a handsome range of labels (including new OWN NAME), strong Showcards that really *sell*—and prices adjusted to meet *all* competition. Can you ask more?

PRICES naturally vary according to your season's contract. If you will send us a card, stating your normal season's requirements, back will come specimen labels for you to choose from and a price at which you will be glad to order. Will you write that card—now—please?

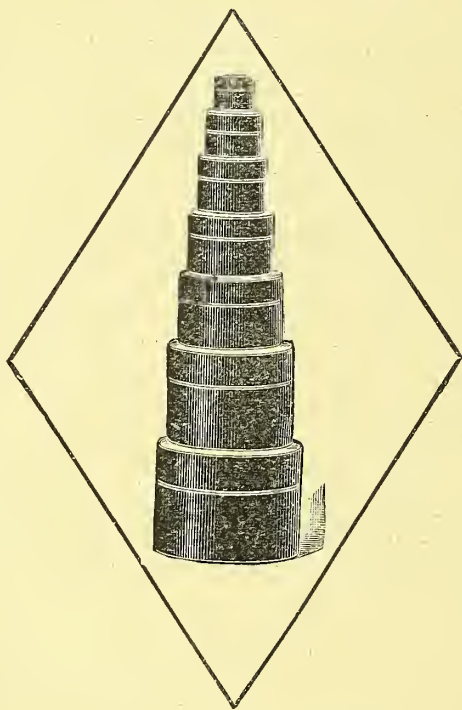
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MENTION ROBINSONS' MAKE

WHEN ORDERING FROM
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YOUR NEXT SUPPLY OF

PILL BOXES



BRITISH MADE BY BRITISH LABOUR.

SUPPORT HOME INDUSTRIES.

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BOXMAKERS TO THE
CHEMIST TRADE

CHESTERFIELD.



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MAKE your windows attractive with a good background.
J. C. KING'S LIST No. 648 OF WINDOW DRESSING PAPERS give specimens of this necessary background.

FROM 1/3 PER ROLL and upwards.

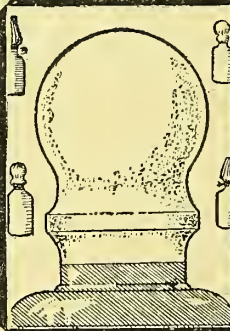
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Sent post-free and free of charge for inspection, on receipt of postcard

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LIMITED,
42-60 GOSWELL ROAD,
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Speciality :
MEDICAL DISPENSING
BOTTLES OF ALL KINDS

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Do not fail to investigate the New and IMPROVED

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SELF - FIXING
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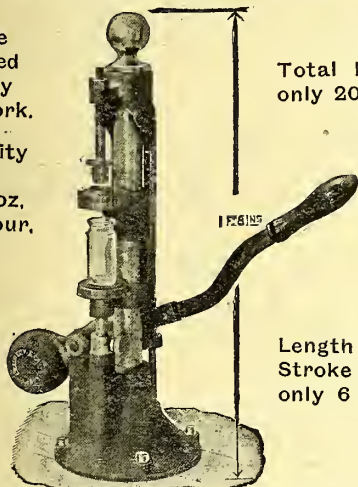
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**THE VISCOSE
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BROMLEY, KENT.
PROMPT DELIVERY.

The "MINIATURE" CORKING MACHINE

for Medicine Bottles, Phials, &c.

Can be adapted for any size cork.

Capacity up to 100 doz. per hour.



Total height only 20 inches.

Length of Stroke only 6 inches.

Will leave cork projecting or drive it flush as desired.

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Makers of Filling, Corking, Bottle-Washing Machinery, etc., etc.

For Bottles at best prices



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WHOLESALE ONLY

In all colours

MEDICAL FLATS

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PERFUMES

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GLASS BOTTLES

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AMBER COLOURED BOTTLES

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FULL RANGE OF

Medicals (plain and graduated),
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Tobins, Vials, Tablets, &c. &c.

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Highest Quality
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WHITE FLINT,
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LOWEST
PRICES.



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CLINICAL THERMOMETERS

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We *can* claim to be the firm able to fix you up from stock with an average of nine items out of a dozen, though of course we can't always do every line asked for. Just let us know what you can do with now, and we will do the rest.

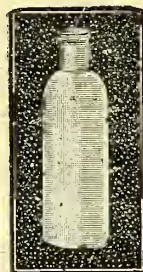


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LIMES
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LIME.

WE STOCK CAPS, WADS, BOXWOOD AND COMPOSITION STOPPERS, TIN BOXES, SAMPLE CASES, & MANY OTHER SUNDRIES



TABLET BOTTLES.



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CHEMICAL & LABORATORY GLASSWARE

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CHARLTON WORKS, CHARLTON PLACE, ISLINGTON, LONDON, N.1.
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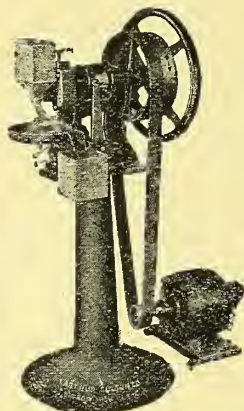
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PILL MACHINES
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No. 2B Tablet Machine

TABLET MACHINES

The ever-increasing demand for Compressed Tablets of a high quality and finish, necessitates the most up-to-date machinery. Colton Tablet Machines are made in a series of models to cover the very wide range of sizes of tablets at present on the market and are adapted for either small or large output.

The No. 2B Model, illustrated, is a most efficient machine with an output of 100 Tablets per minute.

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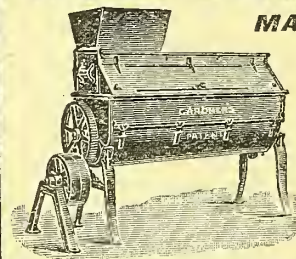
Machines are on view at Kingsway, or prices and specifications will be sent on receipt of enquiry stating full details.

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GARDNER'S PATENT "RAPID" SIFTERS & MIXERS

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working in almost every Trade where POWDERS are Sifted and Mixed and Lumps Reduced, all being done at one operation and without loss by dust.



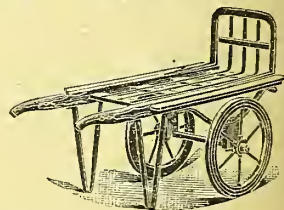
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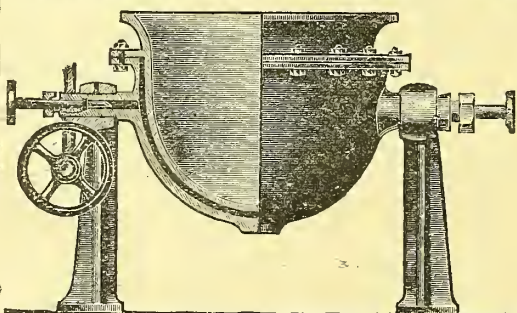


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Manufacturers of Trucks and Handcarts of every description,
Progress Works, HAWKSWORTH, NOTTS.

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Suitable for all Temperatures and Pressures



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PUNCHES AND DIES

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of all makes as well as our own for *over 20 years*.

We have special Machinery and apparatus for the purpose, both for the Machining and Hardening and Tempering; the highest Sheffield experts have experimented for us in order to find the most suitable steel for the purpose, we are therefore in a position to give customers the best they can get.

We are also prepared to **REPAIR or RENEW ALL KINDS OF CHEMISTS' MACHINERY** either our own or foreign.

Send for Lists of our

TABLET MACHINERY OINTMENT & TOOTH PASTE MILLS
GELATINE CAPSULE MACHINERY GRANULATORS
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S. W. WILKINSON & Co., Western Rd., Leicester, Eng.

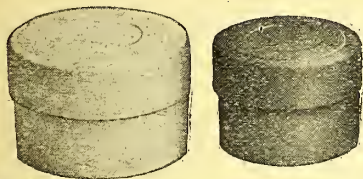
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OINTMENT BOXES

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PILL BOXES

*have replaced the old "Willow" boxes—
Greaseproof—the bottoms cannot fall out.*

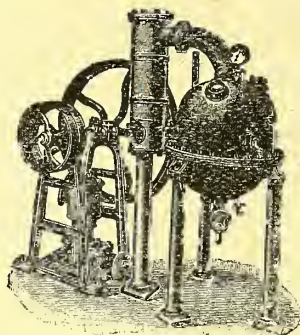


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Kindly mention this Journal when making enquiries.



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EVAPORATING PANS.

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SPECIAL APPARATUS AND PLANT
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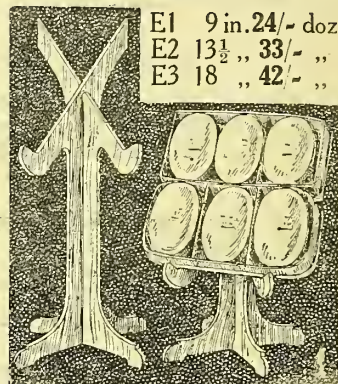
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The main factor in production costs to-day which is dear, not cheap, is labour. We have minimised the incidence of this factor by equipping our Works with the most up-to-date labour-saving machinery, hence we are able to combine as low prices as any house in the trade with the very highest quality and finish and the other attributes of our service which have rendered our name famous throughout the world for our specialities-

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Established 1857.



E1 9 in. 24/- doz.
E2 13½ " 33/- "
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THE SAMWAYS PEDESTAL EASEL of best Birch three-ply.

A pedestal with inclined head, primarily to show the contents of boxes, but in fact permits of a hundred uses. Every Chemist has goods in fancy boxes to show and this is the stand for the purpose.

This pedestal is dainty in appearance but very strong. The base is broad giving stability, the design gives full play to light and shade effects in the window, and the pleasing lines draw the eye and lead it naturally to the object displayed. These stands take away the "flat" look.

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Postage. Allow 1/-. Surplus refunded.

Shop Fitters, Buying Agents, etc., please write to-day for Agency Terms for these specialities.

Every Drummer Dye

represents the
best in home-dye
manufacture.

Whether your customers want a Cold-Water dye, a Hot-Water dye, or a dye to Boil, they will be most satisfied if you recommend them to take Drummer Dyes.

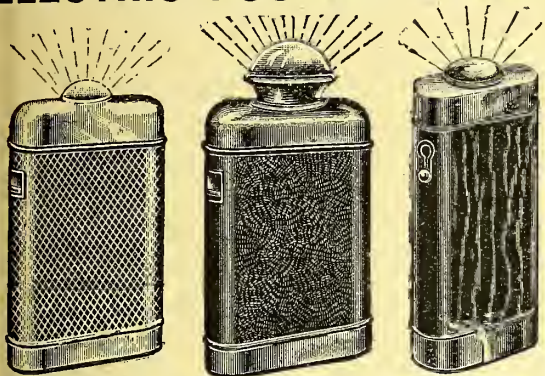


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WM. EDGE & SONS, LTD., BOLTON.

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Most saleable Pocket Lamp Cases, fitted with neat round or oval Lens, assorted attractive covers, reliable patent switch.

Popular Quality, No. 307 ... 4/- doz.
High Grade Quality, No. 515 ... 8/- doz.
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Attractive Pocket Lamp Cases, fitted with large Bullseye Lens (1 1/2 ins.), assorted Covers, reliable patent switch.

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The "Duchess" Waistcoat Pocket Lamp. Size—4 x 2 in. Fitted with small Bullseye Lens, assorted leatherette coverings, reliable switch. Cases only 10/- doz. net.

Suitable "Volex" Dry Batteries 4/- doz. net. Special Opal Type Metal Filament Bulbs 6/- doz.



The Torch of the Season! The "SUNRAY" ELECTRIC TORCH

Size 5 3/4 x 3/4 ins.

BRITISH
MADE.

Fits in the Waistcoat Pocket yet has the capacity of Torches twice the size. Elegant design, high grade finish.

Complete with Battery and Bulb, 20/- doz. net.
Spare Refills 5/- doz. net.

The Refill will hold up in ordinary service for 6 months.



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Size 7 x 1 1/2 in. All Metal Torch of best finish and good appearance. Ebonised Body, Nickel-plated Fittings. Cases only, 15/- doz. Volex Batteries No. T112, 8/- doz. Jewel Metallic Bulbs, 2/8 doz.

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3/6 doz. 52/- Gross.
Super Quality
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Pocket Lamp Bulbs
2 1/2 & 3 1/2 Volts.
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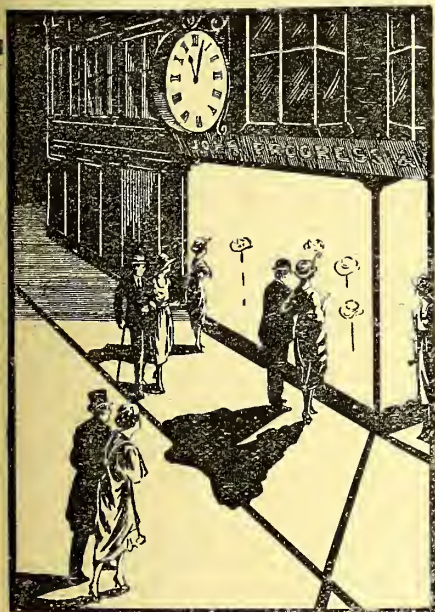
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Size 6 x 1 1/2 in. Strong and reliable. Fitted with patent permanent switch. Cases only, 10/6 doz. Volex Batteries No. T117, 6/- doz. Jewel Metallic Bulbs, 2/8 doz.

Free on Receipt of Trade Card or Memo.
New Catalogue, No. A/25, illustrating a wide variety of Electrical Pocket Lamps, Torches, Medical Coils and Electrical Novelties of every description.

Ward & Goldstone
PENDLETON MANCHESTER LTD.



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"We'll buy it to-morrow!"

Make your Show Window attractive when the passer-by has time to look at it—for 8 months out of the year the evening stroller will turn towards the best lighted streets.

When the door is closed a well lighted window can still do business for you, many hesitate to enter a shop until their decision is made—opportunity to examine the goods and prices at leisure and under a strong and attractive light will make friends for your store.

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ANNOUNCEMENT.

A Huge New MARKET — and generous profits.

A huge new market for Chemists and Drug Stores is opened up by the Advertising of "Germicidal Dog Soap" in 9d. and 1/6 size tins.

This Soap is the first successful attempt to cater for the hundreds of thousands of Dog Lovers in Great Britain with a Soap that not only cleanses, but renders pets free from germs and parasites.

The results of the extensive advertising have been remarkable. Repeat orders arrive by every post, and the warmest tributes are being paid to the wonderful Soap by both users and the Trade.

Powerful publicity is now appearing in the National Press, and local support is given to Special Agents by Advertisements in the local newspapers. A gross profit of over 40% is offered where display is made.

Write at once for details of Window Display terms, etc., to:—

THE HYGIENIC RESEARCH CO. Ltd.

100-106 Moorgate Station Chambers, London, E.C.2.

(Supplies stocked by your usual wholesaler.)

**GERMICIDAL
DOG SOAP**

Every Wise Farmer
Uses



**Tipper's
COWS
RELIEF**



RETAIL PRICES.

2/9, 6/-, 14/-, and
21/- per tin.

Invoiced to the
Trade at

2/6, 5/6, 13/6, and
20/- respectively,
and subject to 20%
discount.

Carriage paid on orders of
40/- net. Postage charged on
small lots.

B. C. TIPPER & SON,
The Veterinary Chemical Works,
BIRMINGHAM.

The Fall of the Leaf

sends hosts of feathered and rodent pests to winter quarters in house, barn and farmyard. Here is the opportunity to increase sales of Birdlime and Ratlime.

KAY'S CHESHIRE BIRDLIME

By selling this standard brand you ensure satisfied customers. Recommend it for ants, earwigs, beetles, and all creeping pests.

In sealed tins for counter sale:—

No. 1.	Approx.	1/2 oz.
" 2.	"	1 "
" 3.	"	1 1/2 "
" 4.	"	3 "

and in bulk.

"DAK" RATLIME

A window display just now will secure you a larger share of the increasing sale. May we send you leaflets and show material?

Tins:—1/- size (for Mice only) 8/- per doz.

2/6 size (for Rats & Mice) 20/- per doz.

£2 orders carriage paid and subject to 2 1/2 % for cash.

From Wholesalers and the Sole Makers:

KAY BROTHERS, Ltd., STOCKPORT

SOX (non-poisonous) INSECTICIDE DYOWEED The Safe Non-Arsenical WEED-KILLER PRIZE-CROP (Alkaline) FERTILIZER

Every ounce is vital plant food.

Generous Trade Terms from

HAWKER & BOTWOOD, LTD., Grays, Essex.

WANTED—Chemists to sell

'Ready Rat Relief' & 'Outem'

FOR RAT DESTRUCTION

"Solventen" for Cockroach destruction

Good Profits, Quick Returns.

B. L. & N. Phillips, Ltd., 124 Southwark St., London, S.E.1

In
Packets
@
5d., 9d. & 1/3
each,
(P.A.T.A.)

FOR QUICK CLEARANCE OF RATS AND MICE

YOU MAY CONFIDENTLY RECOMMEND

BATTLE'S VERMIN KILLER

Prepared only by BATTLE, SON & MALTBY, Manufacturing Chemists,
LINCOLN.

Of all
Patent
Medicine Houses
@
3/-, 5/6 & 9/-
doz.

AS ADVERTISED.

33 1/3% PROFIT

AS ADVERTISED.

IDOF

INSECT BITE REMEDY

Prevents Itching, Irritation & Swelling after an Insect Bite.

In Boxwood Cases, sold at 1/3; in Plain Brass Screw Cap Tops, 1/- each.
From HERTZ & Co., Manufacturing Chemists, 9 Mincing Lane, London, E.C.

IDOF

A new profit maker

LINTOX is providing the chemist with a new profit maker. It is a ready seller, and can be offered to the public with complete confidence, for it has already achieved remarkable success in preventing and curing Distemper in dogs.

*Recommended by the Duke of Beaufort, M.F.H.,
who wrote :*

"I have much pleasure in certifying that your cure for Distemper was tried by me here with the most successful results. . . . I have no hesitation in recommending your cure, and you can make what use you like of this letter."

Lintox

DOES CURE DISTEMPER

Liberal Trade Terms are offered.

Write to the Proprietors:

THE BADMINTON DISTEMPER CURE CO., LTD.

9 KNIGHTSBRIDGE

LONDON, S.W.1

WALLACE HEATON L^{TD}.
CHANGE ALLEY - - SHEFFIELD.

SUTTON'S

CLOUDY AMMONIA

To-day, as ever, the extra strength of
**SUTTON'S
CLOUDY AMMONIA**



makes it the most efficient and the most economical for all purposes,

The enviable reputation of G.F. Sutton, Sons and Co. ensures that in handing out a "Sutton" product the retailer is giving his customer the very finest quality. Doesn't that mean "repeat" orders every time for YOU?

Sole Manufacturers:

G. F. SUTTON, SONS & CO.,
Osborne Works, Brandon Rd.
King's Cross, LONDON, N.7

"A good name is more than riches"

LINSEED OILS

Raw
Boiled
Refined



Langley-Smith & Co.

14/20 St. Mary Axe, London, E.C.3.

Telegrams: "Tallowdom London."
Telephone: Avenue 3820.

Enquiries solicited for all Grades of Oil.

(5)

LIQUID

Sterns B.P.

is guaranteed to be the finest quality of Liquid Paraffin produced. It has the patronage of the largest wholesalers, the recommendation of the Medical profession, and is used in the principal Hospitals in preference to all other kinds.

STERN'S

LTD.,
80 Royal London House,
Finsbury Square,
E.C.2.

PARAFFIN

ESTABLISHED 1839.

PROTECTIVE OVERALL CLOTHING FOR CHEMISTS & DRUGGISTS

**KHAKI DRILL
OVERALL COATS,**
7/11, 10/6, 12/6, 14/6.

WHITE DRILL JACKETS,
6/6, 7/-, 8/11, 10/6.

WHITE DRILL LABORATORY COATS,
10/6, 12/11, 14/11.

BLACK DRILL OVERALL COATS,
15/6.

Postage on Coats 6d. each.



POST ORDERS Promptly and Carefully Executed.
We pay postage on all orders over 20/-.
Samples and special quotations for quantities sent on request.

STOCK SIZES, 34 to 44 Chest. When writing us measure Chest over waistcoat.

GARDINER & Co. (THE SCOTCH HOUSE) Ltd.
(Dept. T.) 1 COMMERCIAL ROAD, LONDON, E.1.
Phone: Ave. 6650 (4 lines). Wires: "Durable, Phone, London."

ESTABLISHED 1839.

Write us for copy of New Illustrated Style Booklet and Patterns of New Acid-Proof Clothing.

WRITE TO

BATTLE'S

FOR

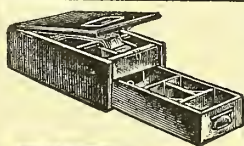
SEED DRESSING REQUISITES

Carbolized Seed Dressing (Farmers' Friend). Sulphate of Copper and Iron, Formalin, Arsenic, Alum, etc.

Household and Athletes' Embrocation for the Football Season.

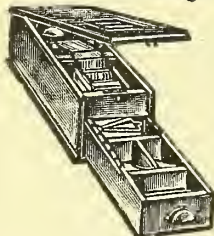
Attractively packed under "own name." Prices on application.

BATTLE, HAYWARD & BOWER (formerly BATTLE, MALTBY & BOWER) Victoria Chemical Works, Lincoln



THE "LITTLE PRINCE" TILL.
Well-seasoned hardwood, Mahogany polished. Alarm Bell. Lid fitted with lock and key. Size over all, 16x8 1/2 x 6 1/2 ins. each **39/6**

Till Coils, 2 1/2 ins. wide, 5/- dozen extra.



THE "EFFICIENCY" TILL.
Solid Mahogany, highly polished. Check action to drawer. Lid fitted with lock and key. Alarm Bell. Spring Clip. Size over all, 18x9x7 1/2 ins. Complete, packed each **77/6**

Can also be supplied in solid Oak at same price
Till Coils, 3 1/2 ins. wide, 5/- dozen extra.

List No. G.D. 1009 of other Tills free on request. Any Till supplied on 14 days' approval upon receipt of cash or two wholesale trade references.

DUDLEY & COMPANY (C.D.)
Holloway Rd., London, N.7.
City Showrooms: 65 Fove Street, E.C.2.

GILLETTE BLADES. U.S.A., 30/- box; Canadian, 28/- box; Valet Razors, "C" Model, 3/9 each, Nickel Case, 6/6; Blades, 3/- package, 35/- box; Ever-Ready Razors, 5/- Standard Model, 23/- dozen; 7/6 The New Yellow Metal Jewellers Compo, 28/- doz.; Blades, 30/- gross. Every Type of Razors and Blades in Stock. Perfect Range of French Shaving Brushes; Send for Sample Range 5/6; Money Refunded if not satisfied. Military Hair Brushes, U.S.A. make, Boxed, 6/- doz.; 3 doz., 16/9. Wellsworth Goggles, fitted with Sir William Crook's Anti-Glare Lenses, 15/- dozen. Post Paid. Cash with all orders.
A. FRANKS, 23 Bartlett's Buildings, London, E.C.4

PUFFS of ALL KINDS in DOWN and WOOL.
SOLID FACE POWDERS
COMPLETE WITH PUFFS.



Inquiries invited by makers,
F. SCHUTZE & CO., Ltd.
BLACK BULL WORKS,
Caledonian Market, London, N.7.



Make the fly season Profitable

During the summer months it will pay you well to push the Wasp Flyband. Neat, hygienic and clean to handle; it has the quickest and biggest sale of any flytrap.

The Wasp holds flies firmly, keeps its condition and satisfies all users. Quick turnover, steady business and liberal protected profit.

The WASP FLYBAND

remains perfectly adhesive and effective for a long time and the container catches all drips. Prompt Deliveries.

Prices & particulars from the sole manufacturers
F. W. HAMPSHIRE & CO., LTD.
Riverside Works, Derby. 2

TINS BOXES & CANISTERS

(made in our own works)
at keenly competitive prices.

Let us quote for any kind or size you need. Or ask for list of STOCK TINS

GOODALL, BACKHOUSE & CO., Leeds.

SHERLEY'S
DOG MEDICINES
INSECT POWDER
SHAMPOO, and
LACTOL
(P.A.T.A.)



These preparations command a ready sale, and are by far the largest advertised of any on the market. They are protected at prices that leave an excellent margin of profit for the retailer, and the terms on which they are supplied preclude any possibility of loss. We have an excellent range of literature and show cards, and do all in our power to assist chemists by referring mail customers to them.

Write for Price List and Terms.

A. F. SHERLEY & CO., LTD.
18 MARSHALSEA ROAD, LONDON, S.E.1
Tel. No.: Hop 1897. Telegrams: "Sherleydom, London."

Warning to the Trade

EUPNINE VERNADE, LACTOBACILLINE, ETC.

LACTOBACILLINE, LIMITED, Registered Offices, 15 Great St. Andrew Street, London, W.C.2, have been appointed the **SOLE REPRESENTATIVES** for **GREAT BRITAIN** and **FREE STATE IRELAND, ETC.**, of **Monsieur LEON DARRASSE** (13 Rue Pavée, Paris) for the importation and sale of **EUPNINE VERNADE, LACTOBACILLINE, ETC.**, for **GREAT BRITAIN** and **FREE STATE IRELAND, ETC.**

Repeated complaints have been made recently regarding the supply and sale of **EUPNINE VERNADE, LACTOBACILLINE, ETC.**, imported into **GREAT BRITAIN** by unauthorised persons.

NOTICE IS HEREBY GIVEN TO THE TRADE that legal proceedings will be taken against all Firms importing or dealing in **EUPNINE VERNADE, LACTOBACILLINE, ETC.**, other than that obtained through the authorized source.

LACTOBACILLINE, LIMITED, further give notice that Messrs. **WILCOX, JOZEAU & CO.**, of 15 Great St. Andrew Street, W.C.2, are their Sole Distributors of **EUPNINE VERNADE, LACTOBACILLINE, ETC.**, for **GREAT BRITAIN** and **FREE STATE IRELAND, ETC.**, and the only authorized source through which **EUPNINE VERNADE, LACTOBACILLINE, ETC.**, may be obtained by the Wholesale and Retail Trade.

Firms holding any stocks of **EUPNINE VERNADE, LACTOBACILLINE, ETC.**, obtained otherwise than through the foregoing source are hereby notified that upon applying to Messrs. Wilcox, Jozeau & Co. their stock will be exchanged for the legitimate stock—value for value. This offer will hold good for the period of one month from the date of this advertisement, but cannot apply to any goods imported after the **date of this notice**.

The foregoing offer is made by **LACTOBACILLINE, LIMITED**, in an honest endeavour to allow the TRADE holding illicit stocks of **EUPNINE VERNADE, LACTOBACILLINE, ETC.**, to relieve themselves of these, and any Firms, Companies or persons who refuse to avail themselves of this offer will render themselves liable to legal proceedings without further warning.

LACTOBACILLINE, LIMITED, request all Firms holding stocks of **EUPNINE VERNADE, LACTOBACILLINE, ETC.**, to communicate immediately with Messrs. Wilcox, Jozeau & Co., stating the amount of the stock they have on hand for exchange in order that they may avail themselves if necessary of this **FINAL OFFER**.

LACTOBACILLINE, LIMITED, Sole Importers and Agents for **GREAT BRITAIN** and **FREE STATE IRELAND, ETC.**, for **Monsieur LEON DARRASSE, PARIS**.

15 GREAT ST. ANDREW STREET, LONDON, W.C.2.

September 5th, 1923.

Interesting Notices from the PHARMACEUTICAL JOURNAL

...would have meant the extinction of the quality—it showed its vigorous growth. Toothpaste is a line every chemist should take an interest in and dealing is further helped by the broadminded policy pursued by the company.

Lacteosote, Ltd., 15, Great St. Andrew Street, W.C. 2, are the sole importers of "Sirop Famel." In the past there have been many instances of unauthorised importations, but it is the intention of the company to put an end to this and ensure that only Sirop intended for the British market, bearing English labels, shall be sold. Messrs. Wilcox, Jozeau, and Co. are the sole distributors, and are the only authorised source through which Sirop Famel may be obtained by the wholesale and retail trade. Firms holding any stocks of Sirop Famel obtained otherwise than through the foregoing source may, on immediate application to Messrs. Wilcox, Jozeau, and Co., have their stock exchanged for the legitimate stock, free of expense.

National Cash Register, Co., Ltd., 225, Tottenham Court Road, London, W.1.—A constant source of error in a shop lies in the mental addition of bills. An error in every case where a customer purchases more than one article is a great part of the loss.

From Issue of June 30th, 1923.

...and so perhaps it will not be used. The dyes of the excellent dyes prepared by Messrs. Basset, Ltd., and J. Mousnier, Ltd., have been appointed sole representatives for the importation into Great Britain and Ireland of Pastilles Valda, Cachets Faivre, and Dragees Gehneau respectively, and also that Messrs. Wilcox, Jozeau, and Co. have been appointed sole distributors of these specialities. This latter is now the only authorised source of supply for the wholesale and retail trade. Although the authorised importers are resolved to take the strongest measures to put a stop to illicit importations, they realised that many firms might unwittingly be holding unauthorised stocks, and there is no doubt that their generous offer to exchange, up to August 23, any such stock now in the hands of retailers or wholesalers will be appreciated—and acted upon. Notice is also given of an advance in price of Cachets Faivre, this being in accordance with prices fixed by the makers. There is no reason to doubt that the general goodwill of the trade towards Messrs. Wilcox, Jozeau, and Co. will be still further enhanced by this equitable and straightforward method of dealing with the matter of unauthorised stocks, and the announcement of the new carriage-paid terms will attract general interest.

Wilcox, Jozeau, and Co., 15, Great St. Andrew Street, London, W.C. 2.—A series of advertisements recently appeared in this journal advising the Trade that Pastilval, Ltd., P. Basset, Ltd., and J. Mousnier, Ltd., have been appointed sole representatives for the importation into Great Britain and Ireland of Pastilles Valda, Cachets Faivre, and Dragees Gehneau respectively, and also that Messrs. Wilcox, Jozeau, and Co. have been appointed sole distributors of these specialities. This latter is now the only authorised source of supply for the wholesale and retail trade. Although the authorised importers are resolved to take the strongest measures to put a stop to illicit importations, they realised that many firms might unwittingly be holding unauthorised stocks, and there is no doubt that their generous offer to exchange, up to August 23, any such stock now in the hands of retailers or wholesalers will be appreciated—and acted upon. Notice is also given of an advance in price of Cachets Faivre, this being in accordance with prices fixed by the makers. There is no reason to doubt that the general goodwill of the trade towards Messrs. Wilcox, Jozeau, and Co. will be still further enhanced by this equitable and straightforward method of dealing with the matter of unauthorised stocks, and the announcement of the new carriage-paid terms will attract general interest.

From Issue of August 18th, 1923.

TO THE RETAIL TRADE IN GT. BRITAIN

Having received so many requests from Retail Chemists to supply our specialities to them direct, we have decided to do so with the following selection of preparations, and are prepared to execute orders of £1 and upwards for the following goods CARRIAGE PAID.

Special Revised Prices, Taking Effect from August 11, 1923.

		RETAIL,	CHEMISTS
SIROP FAMEL...	...	5/-	48/-
VALDA PASTILLES	...	2/-	19/-
CACHETS FAIVRE	...	3/-	27/-
EUPHINE VERNADE	...	5/-	48/-
LACTOBACILLINE	...	3/-	28/10
GELINEAU'S DRAGEES	150's	12/-	108/-
"	50's	5/-	48/-
(100 Dragee Tins withdrawn from the market.)			
All above prices are for stamped goods and nett.			
NATIVELE DIGITALINE (1/600, 1/240)	...	4/-	27/-
FRAISSE'S AMPOULES	...	4/6	40/-

It has come to our knowledge that several Retail Chemists are still holding small stocks of illicit SIROP FAMEL, CACHETS FAIVRE, VALDA PASTILLES and GELINEAU'S DRAGEES. Full page warning notices have appeared in *The Chemist and Druggist* and *Pharmaceutical Journal*, and Chemists are strongly advised to return any illicit stocks to the source they obtained them from and thus secure legitimate stocks without further delay.

WILCOX, JOZEAU & CO.,

Sole Distributors to the Wholesale and Retail Trade in Great Britain, Free State of Ireland, &c.

15 GREAT ST. ANDREW ST., LONDON, W.C.2

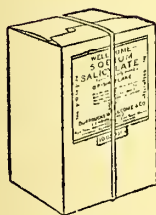


Have you ever thought how big a part your dispensing department plays in the creation of that valuable, yet intangible, asset—Goodwill?

Prescriber and patient rely entirely on your professional knowledge and skill as a dispenser.

You cannot do yourself justice with inferior or unreliable chemicals and galenicals. Therefore build up Goodwill by using 'WELLCOME' Brand products. They attain an exceptional standard of quality.

As a case in point, take



Reduced facsimile

Supplied in powder or flake, in cartons of 1, 4 and 7 lbs. Quotations for larger quantities on request.

TRADE MARK 'WELLCOME' BRAND
 SODIUM
 SALICYLATE

It is physiologically pure, easily soluble, makes a bright, clean solution, water-white and free from dust. The flakes do not stick to the scale-pan.



BURROUGHS WELLCOME & CO.
 LONDON

Grey Rubber Hot Water Bottles

We are booking orders for delivery now, or later
HIGH QUALITY AT VERY MODERATE PRICES.

Sizes.				Lightweight Bottles: Price, nett.	Heavyweight Bottles: Price, nett.
6 × 8 ins.	..	..	..	2/6	2/10
6 × 10 "	..	..	..	2/9	3/2
6 × 12 "	..	..	..	3/4	4/-
8 × 10 "	..	..	..	3/6	4/3
8 × 12 "	..	..	..	3/10	4/8
8 × 14 "	..	..	..	4/3	5/-
10 × 12 "	..	..	..	4/8	5/8
10 × 14 "	..	..	..	5/-	6/-

3 doz. assorted sizes
less a discount
of 2½%

EVERY Bottle fully guaranteed by
the largest makers in the Empire.

12 doz. assorted sizes
less a discount
of 5%

The United Chemists' Association, Ltd., Cheltenham

For Your **LOCAL
CONTRACTS**

Write for
SPECIAL
QUOTATIONS
for
LOCAL
COUNCILS,
HOSPITALS,
WORKHOUSES,
etc.

DISINFECTANTS

PINE OR CARBOLIC
IN FLUID, POWDER OR BLOCK FORM

LYSOL

Guaranteed fully
50% Free Cresols
IN CASKS & DRUMS

BURT, BOULTON & HAYWOOD LTD.

Salisbury House, London Wall, London, E.C.2.

Telephone : London Wall 7569 (4 lines).

Cables : "Burboul, London."



A WEEKLY JOURNAL OF PHARMACY AND OF THE CHEMICAL AND DRUG TRADES

THE CHEMIST AND DRUGGIST is in circulation and reputation the leading journal addressing the Chemical and Drug trades in the British Empire and other countries in the Old and New Worlds. It is the official organ of the Pharmaceutical Society of Ireland, the Chemists' and Druggists' Society of Ireland, and of other Chemists' Societies in the Overseas Dominions.

SUBSCRIPTION RATE

TWENTY SHILLINGS a year payable in advance to any part of the world, including a copy of *The Chemist and Druggist Diary*. Subscriptions may begin with the first issue of any month. Single Copy, 9d., post free; *Diary*, 10s., post free. Postal orders and cheques should be crossed "Bank of Liverpool and Martins, Ltd."

TERMS FOR ADVERTISING may be obtained on application to the Publisher.

Head Office: 42 CANNON STREET, LONDON, E.C.4

Telegrams: "Chemicus, Cannon, London." Telephone: Central 3617 (3 lines).

Branch Offices: 49 County Buildings, 4 Cannon Street, Manchester; (Telephone: City 52.) Melbourne and Sydney, Australia.

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Known, Admitted, and Approved Remedies

FOLLOWING the practice which we started some years ago we propose to reserve space in the forthcoming issue of *The Chemist and Druggist Diary*, 1924, for the registration of formulas for "known, admitted, and approved remedies." Under the Medicine Stamp Act, 1812, such medicines, when sold by chemists, are exempt from medicine-stamp duty so long as the formulas are contained in recognised works of reference and proprietary rights are not claimed. A clear indication must be given, on the label of the medicine, of the published formula as evidence that the medicine is of the kind to which the exemption refers. *The Chemist and Druggist Diary* was the first book of reference recognised by the Board of Customs and Excise, after the British Pharmacopœia, and the *Diary*, being published periodically, affords an exceptional opportunity for chemists to add any fresh formulas for medicines coming within the definition of "known, admitted, and approved remedies." Chemists who desire to take advantage of this arrangement should forward true copies of the formulas with the titles and directions for use so that we can include these in the *Diary*. We shall attach the correct reference numbers to the formulas when they are published. The formulas, which must be written on one side of the paper only, should be sent not later than October 13, addressed to the Editor, C. & D., 42 Cannon Street, London, E.C.4.

Summary of this Issue

The more notable items only are dealt with

The Week's News

A proposal is on foot in South Africa to form a Pharmaceutical Society to represent the whole of the Union while maintaining the existing local societies (p. 348).

The Pharmaceutical Society of the Cape Province are to form a committee to deal with matters affecting the interests of their members, particularly in regard to the Medical, Dental and Pharmacy Bill and the Patent Medicine Tax (p. 348).

Trade and Market Matters

In an editorial article on p. 360 we comment on the outstanding features of the shellac market.

We give some first-hand information on the new French chamomile crop, for which excessive figures are asked (p. 369).

Pacific Coast advices in regard to cascara sagrada intimate supplies are becoming more and more inaccessible; the collection this year is very small, as labourers can earn much higher wages in the lumber mills (p. 369).

That section of the Mincing Lane markets dealing with Japanese products, such as menthol, mint oil, camphor, etc., has been somewhat excited, and spot prices show a considerable advance as a result of the Japanese calamity. Other changes include an advance in morphine and codeine and salts. Mercury and senega are easier. Borax products (including boric acid) and bleaching powder are cheaper (p. 365).

C. & D. Retail Price List

THE drug index for August shows only the slight variation characteristic of the holiday season, the figure being 156.5 against 157.2 in July. There is again no change to chronicle in regard to the surgical dressings index. Among the price alterations, which are mainly unimportant the most notable are balsam toluat., ol. lini, ol. oliivæ, ol. terebinth., quebracho cort., and tr. opii crocat. Increases, in addition to those given last month, include amyl acet., cocain., elix. phosphor., ext. cascara, ol. eucalypt., ol. sassafras, and opium, its alkaloids and preparations. The chief decreases in prices are recorded in the following: Ac. citric., anthem. flor., cambog., camphor. flor., carui fruct., cydon sem., dammar gum., ol. pimëntæ, some potash salts, santolin., spt. vini meth. (gal. qty.), ung. canthar. and zinci oxid.

Sale of Poisons by Wholesale

THE booklet dealing with the sale of poisons by wholesale, which we have compiled for the benefit of those in the service of wholesale houses, is now ready, and can be obtained post free at the following prices for cash with order:—

	s.	d.
Per booklet, post free	...	1 0
3 booklets, post free	...	2 9
12 booklets, post free	...	10 0
25 booklets, post free	...	20 0
50 booklets, post free	...	35 0
100 booklets, carriage paid	...	60 0

The booklet, measuring 3½ in. by 5½ in., gives concise information regarding the restrictions governing the wholesale sales of dangerous drugs and poisons in Part I. of the Poisons Schedule of the Poisons and Pharmacy Act, 1908, to medical practitioners, dentists, veterinary surgeons, chemists and others licensed to possess them. The "safety limits" given in the booklet enable dealers immediately to decide whether a preparation comes within the terms of the Acts, and an Extended List of poisons provides easy reference to the pharmaceutical preparations in general use, the "dangerous" drugs being distinctly marked.

English and Welsh News

The Editor would be obliged if subscribers will send him marked copies of newspapers containing items of interest for insertion in this or other news sections.

Poisonings

The following cases of fatal poisoning, among others, have been recorded since our last report:—

An inquest was held by the West London coroner, on September 3, on the body of Mr. Albert T. Coombe, M.R.C.S., a retired medical practitioner. Dr. Nash, who had purchased the deceased's practice, gave evidence to the effect that Mr. Coombe sent for him a month ago, but refused to be examined or to take medicine. The *post-mortem* examination showed that death was due to hydrocyanic-acid poisoning, and a verdict of "Suicide while of unsound mind" was recorded.

Other cases include suicides by spirit of salt and by salt of lemon. In the latter instance there was an agreement between two persons to commit suicide, and the survivor was committed for trial.

Ministry of Health Report

The fourth annual report of the Ministry of Health, covering the official year ended March 31, 1923 (Cmd. 1944: Stationery Office, 4s.), includes a statistical review of drug-trade matters concerning which it is useful to have annual figures available. Taking first the analyses carried out in respect of samples of food and drugs, we learn that the percentage of adulteration of drugs has increased from 6.7 per cent. in 1921 to 7.3 per cent. during 1922. Of 429 prescriptions analysed, 96 (22.4 per cent.) were found to be inaccurate, as compared with 16.3 per cent. of those taken in 1921. (It is not clear whether these are reckoned among the total of 5,863 samples of "drugs" analysed.) Cocoa was tested in 1,851 instances, and 26 samples were condemned as containing more than $\frac{1}{100}$ gr. of arsenic per lb. Vinegar was reported against in 110 cases out of 1,968 (5.6 per cent.); the forms of adulteration turned out to be mainly dilution or the substitution of a coloured mixture of acetic acid and water. Cornflour was found on one occasion in arrowroot to the extent of 50 per cent., and eight samples of aerated waters were condemned on account of contamination with copper, lead, or zinc. Salicylic acid has been reported in samples of coffee extract, but "it is understood that the trade has undertaken to discontinue its use." An analyst, in commenting on "a popular brand of lemonade powder" which was suspected of having caused vomiting in the case of several children, expressed the view that the tartaric acid contained in the powder might have given rise to this symptom. National Insurance statistics receive extended notice. The total cost of drugs and appliances supplied by chemists was "approximately £1,212,000" for England, and £270,782 17s. 2d. for Wales. The number of Insurance prescriptions dispensed in England by chemists was about 33,400,000, and in Wales 1,971,881. It is stated that the procedure in connection with investigations into questions of excessive prescribing has been discussed with representatives of Insurance practitioners, and that revised arrangements are contemplated. During the year representations were made for the removal of five chemists from the panel; the results, however, are not recorded. Supplementary grant was withheld from 121 doctors and 16 chemists, the amounts in respect of the latter ranging from £1 to £5. In Wales Insurance practitioners were surcharged sums ranging from £1 5s. to £150, but no inquiries were held relating to chemists. The figures for venereal-disease patients show that the number of fresh cases has declined from 79,000 in 1921 to 68,600 in the year under review, and that, of these, 16,500 were found not to be so infected. The number of fresh cases at Welsh centres was 4,716 (5,173 in 1921). Dental benefit for insured persons is referred to with the explanation that "it is necessary to correct the common misapprehension that the Department have set up panels of dentists for the provision of dental treatment." Under the heading "Alkali, etc., Works Regulation Act, 1906," we read that the number of alkali and other

works registered was 1,240 (1,283 in 1921), and that users of chlorine are increasing in consequence of the availability of liquid chlorine. Finally, the question of improving water supplies is referred to in the cautious statement that "steps are being taken in the direction of formulating proposals for the outlines of a national policy."

Liverpool

Regret is expressed here at the retirement, through ill health, of Mr. R. Short (J. & E. Atkinson, Ltd.), who is succeeded by Mr. W. A. Brotherton.

Mr. W. J. Talintyre (Ayrton, Saunders & Co., Ltd.) has left Liscard for Ashton-on-Ribble, Preston, so as to be on his business ground.

The deputy-stipendiary of Liverpool, on September 1, bound over, for a year, a youth who, as errand boy at a local pharmacy, where he had been employed for eleven months, had decamped with £24 entrusted to him, as on former occasions, to carry from one shop to another.

Liverpool was the venue on September 5 of the first quarterly communication of the Grand Lodge of English Freemasons held out of London. Great interest was taken by pharmaceutical and other brethren who drew tickets (2,500 for 3,500 applicants) in the ballot.

Flags were put at half-mast at Liverpool Town Hall and the magisterial offices as a tribute to the memory of Dr. Edmund Knowles Muspratt, J.P., a former member of the City Council, the Lancashire County Council, and the first Pro-Chancellor of the University of Liverpool, the donor of the Muspratt Chemical Laboratory.

Manchester

The business known as The Patent Medicine, Drug & Chemists' Supply Co., Ltd., 147 Fairfield Street, Ardwick, is now solely owned by Mr. Charles Pike.

The formation of a new industrial area almost as great as that of Trafford Park is announced. About 5,000 acres of land abutting on the Manchester Ship Canal has been marked out, and the names of several large manufacturers are already mentioned as having acquired sites. The local rates are declared to be only half those of Manchester.

At Manchester City Police Court, on August 29, James Henry Hadfield (45), described as a fully qualified chemist and a native of Birmingham, was sent to prison for three months for stealing a hospital collecting-box, containing about 40s., from the counter of a city hotel. Hadfield, who was sentenced to three months' imprisonment last May for a similar offence, was warned that a repetition of it would result in him being sent for trial at the sessions.

Sheffield

Payments to chemists for Insurance work during the past month amount to £1,462 7s. 10d.

In order that the chemist may have time to procure supplies of insulin, forty-eight hours' notice is to be given by the hospitals.

It is hoped that the new telephone exchange, when completed, will eliminate most of the complaints made by chemists against that department.

An inspector under the Dangerous Drugs Acts has been calling on several medical men in the district, who were, in most cases if not in all, notified of the intended visit. A similar courtesy would be appreciated by chemists.

The programme for the coming session of the Sheffield Pharmaceutical and Chemical Society is completed, and promises to be one of the most active for some years. The fear expressed in some quarters of the branch of the Pharmaceutical Society clashing with its activities does not appear to have been justified.

Miscellaneous

BUGLARY.—The premises of Mr. W. Deacon, chemist and druggist, Bridgwater, were recently broken into and a sum of money was stolen.

SHOPPING CARNIVAL.—A first-class diploma was awarded to Browns (Chemists), Ltd., for their display in the

"things-to-use" section of the recent shopping festival at Clitheroe.

INQUEST.—At Southport, on August 31, an inquest was held on the body of the wife of Mr. S. J. Elliott, pharmacist at the Southport Infirmary. Medical evidence showed that death was due to asphyxia, and a "Misadventure" was recorded, the coroner expressing his sympathy with the widower.

SOUTHPORT CHEMISTS' MOTOR TRIP.—Southport pharmacists had an enjoyable evening excursion recently, taking a motor charabanc into the country in the direction of Hesketh Bank, near Preston. The party included Messrs. A. H. Messenger (ex-President), W. H. Kendrew (secretary) and J. W. Gee (treasurer).

IN THE COURTS.—At Bow Street Police Court, London, on August 30, Joseph A. Pickard, consulting chemist, was fined £6, including costs, for travelling on the Central London Railway without having previously paid his fare and with intent to avoid payment.—At Nelson (Lancs.) Police Court, on August 31, Hilda Holmes, charged on remand with sending to William Foy carbolic acid mixed with whisky (*C. & D.*, September 1, p. 319), was ordered, on a medical report, to be sent to a workhouse.—At Brighton, recently, Leonard P. Vaughan, described as a chemist, was fined £1 for riding a bicycle on a footpath.

Scottish News

Sale of Methylated Spirit

The movement for the better regulation of the sale of methylated spirit is receiving an increasing amount of support in Scotland, particularly in the cities and large towns. The following suggested reforms, drawn up by the Convention of Burghs after consultation with the Pharmaceutical Society and chief constables, have been accepted by Dundee Town Council:—

(1) The production of a licence or certificate from the magistrates as a condition precedent to the grant of an Excise licence for the sale of methylated spirit; (2) the recovery by the police as well as by the Excise of penalties for the illicit sale of methylated spirit; (3) the compulsory keeping of records of sales and purposes for which sold with names and addresses of purchasers; (4) the scheduling of methylated spirit as a poison under the Poisons and Pharmacy Act, 1908.

When the proposals were discussed by Aberdeen Town Council, on September 3, it was urged that if the sales were hedged with restrictions it would be difficult for people who wanted it for legitimate trade or domestic purposes to get it, and that application of No. 4 would put the whole business into the hands of the chemists. The Council finally decided by nineteen votes to twelve to support the first two resolutions.

Brevities

An attempt was recently made to break into the premises of Mr. G. Cooper, chemist and druggist, Kilsyth.

Mr. George McGregor, retired chemist and druggist, Ellon, was presented on August 28 with his portrait in recognition of his services to the community, and particularly in connection with the Victoria Hall. Mr. McGregor, who is eighty-six years of age, went to Ellon in 1864, and for a long period carried on the business in Market Street, now in the hands of his son, Mr. William J. McGregor, chemist and druggist. He served on the Town Council and on the School Board, and was one of the original members of the old Ellon company of volunteers. Another son, Mr. George A. McGregor, chemist and druggist, is in business in Dufftown. The portrait is to be hung in the Victoria Hall.

Edinburgh

The autumn holiday falls on September 17.

A Scottish newspaper states that chicory, "a plant somewhat uncommon to Edinburgh," may be seen in full bloom in the Comiston Road.

An explosion occurred on the premises of Duncan, Flockhart & Co., Holyrood Road, on August 31, caused, it is believed, by the fusing of an electric wire and a spark coming in contact with some ether fumes. Two men were working on the ether plant at the time, but neither was seriously injured, nor was the material damage very important.

Glasgow

The chemistry of yeast was dealt with by Dr. David Ellis, Royal Technical College, in the "Glasgow Herald," August 31.

The death has occurred of Mr. George Murdoch, whose father was at one time a partner in the well-known firm of Murdoch Bros., chemists, Sauchiehall Street.

Mr. L. Wolfson, chemist and druggist, who, as announced in the *C. & D.*, I., 1923, p. 862, is shortly giving up business at 188 High Street, Ayr, will transfer his business to 22 Govan Street, Glasgow.

Irish News

Alleged Contravention of Firearms Act

At the Belfast Police Court, on August 29, Frank McGough, described as a traveller, of 2 Upper Mount Street, Dublin, was charged under the Firearms Act with having an explosive substance, chlorate of potash, in his possession. Sergeant Fitzpatrick deposed to conducting a search of the premises of Alex. Morgan & Co., 90-92 Albert Street. On the floor there was a quantity of lump salt, and there were also forty-seven barrels which contained chlorate of potash. A box was found on the counter and contained some cardboard cartons, some empty and some full of chlorate of potash, and labelled "Ideal Salt." Witness said he did not know that the prisoner was a dealer in chemicals or that he traded as the "Irish Chemical Manufacturing Company." He had found that in February accused had consigned forty barrels to Dublin. Henry O'Neill deposed that accused came to him in February and said he was going to start a salt company. He gave the name of Alex. Morgan & Co., and rented a store at 25s. per week. He was there for nearly three months, but disappeared, leaving the rent in arrears. Accused was returned for trial, bail being refused.

Pharmaceutical Society of Ireland

The latest dates for receiving applications for the October examinations are as follows: The Preliminary examination, Thursday, September 20; the Registered Druggist examination, Tuesday, September 25; the Pharmaceutical Licence examination, Wednesday, September 26; the Pharmaceutical Assistant examination, Saturday, September 29.

Intending new candidates for election to seats on the Pharmaceutical Council should note that they must be proposed and seconded by members of the Society or Associate Druggists; the nomination paper, with an intimation in writing from the candidate that he will serve if elected, must be in the Registrar's hands by 12 o'clock (noon) on September 17.

Northern Pharmacists to Meet

A general meeting of the licentiates of the Pharmaceutical Society of Ireland domiciled in the six county area is to be held in order to consider the resolution arising out of the existing situation. The object of the meeting is set out in the circular as follows: "To discuss and formulate a plan of action to preserve the privileges and rights of licentiates in Northern Ireland, which are seriously endangered by contemplated legislation of the Northern Government. Any such legislation may involve the abolition of the registered druggist grade at the expense of the pharmaceutical qualification, and consequent lowering of our status with probable non-recognition outside the limited area of Northern Ireland." Mr. R. G. McKinstry is acting as secretary of the meeting which has been called by the general committee appointed at a trade meeting two years ago.

South African News

(From "C. & D." Correspondents.)

"The Chemist and Druggist" is supplied weekly to members of all the Chemists' Societies in South Africa

The Union

PATENT MEDICINE TAXES.—Under the Customs and Excise Duties Amendment Act, 1923, a list of patent and proprietary medicines liable to stamp duty under the Act has been issued. The list contains the names of over eleven hundred "patents," and is issued as a guide to dealers and others. It does not claim to be a comprehensive and complete one, and the fact that any article or preparation has been omitted does not release the person from the penalties provided for failure to comply with the provisions of the Act. There is also a list of so-called Dutch medicines exempt from Section II of Act 23 of 1923 from liability to stamp tax when put up in packages hitherto recognised by the trade.

SELECT COMMITTEE ON THE SOUTH AFRICAN PHARMACY BILL.—We learn from the Association of Manufacturers of British Proprietaries that the evidence given before the Select Committee on the South African Medical, Dental and Pharmacy Bill, reported in our issue of September 1 (p. 322) contained a misstatement of fact with regard to the British Minister of Health's proposals in 1920. Instead of the remark that "in 1920 the Health Ministry in England brought in a Bill which originally contained a proposal for the disclosure of the formula, and that was examined by a Select Committee, and the Select Committee struck out the provision for the disclosure," it should have been stated that the Bill brought in by the Minister in August, 1920, originally included a proposal for disclosure of formula, but that, after a series of conferences between officials of the Association and Manufacturers of British Proprietaries and the Minister of Health, the obnoxious clauses relating to compulsory disclosure were entirely deleted.

FAILING TO STAMP "PATENTS."—Mr. W. E. Crow, a Sea Point chemist and druggist, and Hayman Narunsky, a general dealer, of Woodstock, Cape Colony, were found guilty and reprimanded at the First Criminal Court recently for offering for sale certain patent and proprietary medicines which were not stamped in accordance with the requirements of the Customs and Excise Duties Amendment Act. In view of this being the first prosecution under the Act we give part of the evidence:

Robert Chamberlain, an officer of the Customs and Excise Department, said he visited the chemist shop of W. E. Crow at Sea Point on July 20. The patent medicines produced in Court, he said, were all found exposed for sale in the shop. None of the bottles, boxes or containers was stamped. The accused told him at the time that he was short-handed and did not have time to stamp all the articles. Witness noticed that Chamberlain's Cough Mixture and California Syrup of Figs had been stamped. He visited the shop the following day and found the chemist's assistant busy stamping the articles. He had no reason to doubt the statement of accused that he was stamping all the articles before he sold them. Accused: "I drew your attention to the fact that 'ready' or 'quick sellers' were stamped?"—"Yes."—"Woodward's Gripe Water and another heavily-advertised preparation—Owbridge's Lung Tonic—was that stamped?" asked accused. "I think so."

Accused, who defended himself, said that immediately after the statement by the Minister of Finance in the House of Assembly recently concerning the medicine tax, he consulted his solicitors. He then went to the Excise Office and asked an officer there upon what Act he relied in this matter, and also whether he, accused, might be allowed to tender a bond, which the law provided for. The officer replied that he was not going to be bothered with any bonds. Accused then asked him what would happen supposing the question was not finally approved by Parliament. The officer replied: "Oh, that will go through within a week or ten days." Magistrate: "You are charged with contravention of the Act. Has the foregoing any bearing on the case?" Accused: "I only want to state my *bona fides*, your Worship." Magistrate: "Do you contend, then, that it was in view of something this Excise officer told you that you did not stamp your goods?"—"Yes, your Worship. I felt that I was not bound to stamp everything at once. I applied for a copy of the Act on the subject, and I also wanted a list of the articles. I eventually got the only list there was left, but I could not get a copy of the law."

After further evidence, the accused was found guilty, but in view of the evidence he was reprimanded and discharged.

Pharmaceutical Society of Cape Province

A MEETING was held in the Society's rooms on July 18, Mr. T. J. Hughes presided, and there were present—Messrs. F. C. Mathew, D. Dale, W. Asher, J. Sloan, C. W. Faull, W. A. Sleggs, A. E. Linley, J. Sowden, J. H. Harries, and the Hon. Secretary (Mr. H. E. Buxton). In opening the meeting, Mr. Hughes expressed the regrets of the Society that the President (Mr. M. W. Clancy) was unable to be present through illness, and trusted that he would have a speedy recovery.

Mr. H. E. Buxton, the secretary, read a paper on "Insulin." The Chairman tendered the thanks of the Society to Mr. Buxton for this paper, which had been greatly appreciated, and expressed the wish that in future other papers would be introduced by members.

Mr. Mathew stated that at the Society's deputation to the Commissioner of Taxes and his advisers, it was understood that a certain amount of amelioration of the conditions of the Act would be granted, but he regretted that such was not the case, and that the Excise Department were adverse to the acceptance of various titles and terms submitted. In view of this, he urged that the assistance and co-operation of the various pharmaceutical organisations be obtained with a view to co-ordination in combating the anomalies of the tax. Mr. Faull considered that a general move was being made by the Government to take away the rights and privileges of chemists and druggists. Mr. Dale maintained that, unless there was concerted action on the part of all chemists and druggists in the Union, very little could be done, and as at present there was no organisation existing, it was most necessary that such an organisation should be formed, and if necessary they should be prepared to fight the case in the Courts. He considered that the Patent Medicine Tax should either be repealed or amended so as not to interfere with the legitimate rights and privileges of chemists and druggists. He mentioned that the Transvaal chemists and druggists were well organised, and he understood that they were willing to associate themselves with any unified move. These ideas cost money, but as there were over 500 registered chemists and druggists in the Union, if each contributed, say 30s. each, a fair amount would be available to set things going, and he suggested the appointment of a committee to deal with the following matters: (1) Status of Pharmacists; (2) Medical, Dental and Pharmacy Bill; (3) Patent Medicine Tax; (4) Foods, Drugs and Disinfectant Bill.

After Messrs. Sowden and Linley had spoken on similar lines, the Chairman put Mr. Mathew's motion to the meeting, which was seconded by Mr. Faull and carried.

Mr. Dale then proposed that a committee, consisting of Messrs. F. C. Mathew, Faull, Hughes, Linley, and the mover, be formed, with power to act; to draft a circular on the lines of Mr. Mathew's motion, to be sent to each chemist and druggist and pharmaceutical organisation in the Union, the Committee to report a month hence; that the Committee function immediately and that Mr. Hughes be the convener, the first meeting to be at the Society's rooms at 8 o'clock, July 23. Mr. Faull seconded the motion, which was carried. Mr. Asher proposed that the Secretary be instructed to write to the Retail Chemists' Association re amalgamation of forces. Mr. Sowden seconded, and the motion was carried. Mr. J. Sloan was appointed treasurer in lieu of Mr. A. Ross, who has resigned. Before closing the meeting, the chairman extended a hearty welcome to Mr. Benjamin, of Port Elizabeth, and requested that he would inform the meeting of the activities of the Port Elizabeth chemists and druggists relative to the Patent Medicine Tax. Mr. Benjamin, in replying, thanked the chairman for his welcome, and stated that an effort had been made to organise, but with poor results. He would certainly inform the Port Elizabeth chemists and druggists of the keen interest exhibited in pharmaceutical matters by the Cape Town chemists.

New Companies and Company News

P.C. means Private Company and R.O. Registered Office

CYANAMID PRODUCTS, LTD. (P.C.).—Capital £5,000. Objects: To carry on the business of manufacturers, refiners, importers and exporters of and dealers in cyanamid, cyanide and other chemicals and chemical products, etc. R.O.: 232 Salisbury House, London Wall, E.C.2.

PHARMACEUTICAL SUPPLY CO., LTD. (P.C.).—Capital £3,000. Objects: To adopt agreements (1) with L. Cornelis and (2) with R. C. Butler, and to carry on the business of manufacturers of and dealers in pharmaceutical, medicinal, chemical, agricultural, industrial and other preparations and articles, etc. Solicitors: Cohn, Seligman & Bax, 52 New Broad Street, London, E.C.2.

SOPEX CO., LTD. (P.C.).—Capital £1,000. Objects: To carry on the business of manufacturers of soap, manufacturers and refiners of and dealers in all kinds of oils and oleaginous and saponaceous substances, pharmaceutical, manufacturing and general chemists and druggists, manufacturers of and dealers in toilet requisites, boxes and cases, wholly of card, wood, metal or otherwise, etc. Solicitors: Harold Elwell & Co., 65 Coleman Street, London, E.C.

ASHTON SIDNEY, LTD. (P.C.).—Capital £1,000. Objects: To carry on the business of chemists, druggists, dry-salters, oil and colour men, importers and manufacturers of and dealers in pharmaceutical, medicinal, chemical, industrial and other preparations, makers of and dealers in chemical, photographic, surgical and scientific apparatus and materials, etc. The permanent governing directors are: A. Rosenberg, cap manufacturer (chairman), and T. B. Ashton, chemist. R.O.: 103A Lapwing Lane, West Didsbury, Manchester.

H. EDWARD HOPE & CO., LTD. (P.C.).—Capital £7,000. Objects: To take over the business of oil and colourmen and varnish manufacturers carried on by H. E. Hope and A. Cawood as H. Edward Hope & Co., and to carry on the same and the business of manufacturers of and dealers in distempers, washes, enamels, pigments, oils and colouring materials, disinfectants, deodorisers, liquid and other manures, and agricultural, veterinary, surgical and other preparations, chemists, druggists, etc. R.O.: 21 Lower Mall, Hammersmith, London, W.

SILLOTH PRODUCTS, LTD. (P.C.).—Capital £3,000. Objects: To carry on the business of manufacturers and factors of, agents for and dealers in foods and food products and beverages, whether of a completely or only partially manufactured nature, and whether the same shall be in the nature of confections, medicinal foods, health or physical culture, aids, patent or proprietary medicines, etc. The first directors are: A. C. Bennett, W. B. English and C. Hawkins. R.O.: Confectionery Works, Esk Street, Silloth, Cumberland.

E. & T. PINK, LTD.—A meeting of the creditors of this company was held in London on August 30, when the statement of affairs showed liabilities of £235,904 3s. 10d. The liquidators were authorised to continue the business pending the carrying through of a scheme for the payment of a composition of 11s. in the £. The following are among the creditors:—Sydney Harvey & Co., Ltd., £2,519; Corn Products Co., Ltd., £1,030; W. J. Bush & Co., Ltd., £722; Chas. Zimmermann & Co. (Chemicals), Ltd., £692; Eburite Paper Co., £338; W. C. Bacon & Co., Ltd., £278; Jules Lang & Son, £122; W. H. Hobbs & Co., Ltd., £117; Victor Blagden & Co., Ltd., £105; The United Alkali Co., Ltd., £93; Lever Brothers, Ltd., £75; James Burrough, Ltd., £64; United Glass Bottle Manufacturing Co., Ltd., £63; Cooke, Tweedale & Lindsay, Ltd., £44; Lewis & Peat, Ltd., £42; Welch & Horner, £42; Leon Frenkel, £40; A. Boake, Roberts & Co., Ltd., £31; Le Personne & Co., £28; Roberts Capsule Stopper Co., £26; London Essence Co., £25; Samuel Potter, £23; Fredk. Boehm, £19; Stevenson & Howell, Ltd., £18; Richard Wheen & Sons, Ltd., £16.

Stock Exchange Prices

£1 Shares unless otherwise stated	Dec. 29, 1922	July 31, 1923	Aug. 31, 1923
	s. d.	s. d.	s. d.
Allen & Hanburys, 7% Prefd. Ord...	20 6	21 9	21 9
Apollinaris and Johannis, Ord. £10...	15 0	16 3	15 0
5% Pref. £10	35 0	48 9	47 6
Ash (Claudius), Sons & Co., Ord. ...	11 6	16 0	15 0
Ayrton, Saunders & Co., 7½% Pref.	14 3	15 6	16 0
Bell (John) & Croyden, 10% cum. Pref.	15 6	15 0	15 0
Benger's Food, Ord.	37 9	40 0	39 6
Boake (A.), Roberts & Co., 5% Pref. £10	£6½	£6½	£6
Boots Pure Drug, Ord.		88 9	92 6
Boots Pure Drug, 7% "A" Prefd. Ord.	22 6	22 9	22 9
Boots Cash Chemists (Eastern), 6% "A" Pref...	20 6	21 6	21 6
Boots Cash Chemists (Laneashire), 6% "A" Pref...	20 6	21 6	21 6
Boots Cash Chemists (Southern), 6% "A" Pref...	20 6	21 6	21 6
Boots Cash Chemists (Western), 6% "A" Pref...	20 6	21 6	21 6
Borax Consol., Defd. Ord. ...	36 3	39 0	39 0
Bovril, 6% Pref. ...	21 6	23 3	22 6
" Ord. ...	23 3	23 6	23 0
" Defd. ...	21 6	26 9	28 0
British Cellulose & Chemical Ord. ...	9 0	15 1½	13 9
7½% Pref.	12 6	15 0	13 9
British Cyanides, Ord.	20 0	24 3	24 0
British Dyestuffs Corp., 7% Pref...	7 9	8 3	7 3
" Prefd. Ord.	4 9	5 3	4 7½
British Glues and Chemicals, Ord. ...	5 0	5 0	4 0
8% Pref.	14 9	14 0	12 0
British Oil and Cake Mills, Ord. ...	27 3	27 0	26 6
British Oxygen, Ord. ...	40 0	42 6	43 9
Brunner Mond, Ord. ...	37 3	38 7½	39 6
7½% Pref. ...	27 3	28 6	29 6
Bush (W. J.) & Co., 5% Pref. £5	65 0	67 6	65 0
Cadbury Bros., 6% Pref. ...	23 1½	23 0	23 3
Callard, Stewart & Watt, Ord. ...	22 6	23 9	25 6
5½% Pref.	16 3	17 6	17 6
Crosfield (Joseph) & Sons, 6½% Pref.	19 6	20 6	20 6
De Trey & Co., Ord. ...	16 0	17 6	16 9
Eastman Kodak, Com. (No Nominal Value) ...	\$95	\$117	\$118
6% Prefd. \$100	\$120	\$120	\$122
Evans Sons Leseher & Webb, Ord. ...	7 0	5 6	5 6
5% Pref.	10 3	9 3	7 6
Field (J. C. & J.), Ord. ...	16 3	14 6	15 0
7% Pref.	19 6	20 3	19 0
Idris & Co., "A" Ord. ...	10 0	10 0	12 6
Ilford, Ltd., Ord. ...	21 3	21 0	21 3
6% Pref.	18 9	18 9	19 0
Kent (G. B.) & Sons, 5½% Pref.	15 0	14 6	15 0
Knight (John), 25% Prefd. Ord. ...	57 6	59 0	60 6
Lever Bros., Ltd., 7% Pref. ...	20 7½	22 0	22 0
8% Pref.	19 4½	21 0	21 0
20% Prefd. Ord. 5s.	10 9	10 6	10 6
Liebig's Ext. of Meat, Ord. £5	£13½	£14½	£15
Magadi Soda, Ord. ...	4 0	2 3	1 10½
Mellin's Food, 6% Pref. ...	11 3	13 1½	12 0
Mond Nickel Co., Ord. ...	31 3	36 3	37 6
7% Cum. Pref.	24 3	24 9	25 3
Nathan (Joseph) & Co., 7% Pref.	19 3	14 9	14 3
8% Prefd. Ord.	18 3	12 6	9 6
National Drug and Chem. Co. of Canada, 6% Pref. ...	17 6	18 6	19 0
New Transvaal Chemical Co., 6% Pref.	18 0	18 1½	18 1½
8% Pref.	19 4½	22 6	22 6
Salt "Union", Ord. ...	19 9	18 6	20 9
Pref.	23 6	22 3	22 0
"Sanitas", The Co., 9% Pref.	22 6	24 0	24 0
Schweppes, Ltd., Ord. ...	17 6	19 0	19 3
Defd. ...	9 6	13 0	13 0
Smith (Stephen) & Co., 6% Pref.	28 9	28 9	28 9
Southall Bros. & Barclay, Ord. ...	44 0	47 0	47 6
5% Pref.	18 6	18 0	19 6
Spratt's Patent, Ord. ...	35 0	31 3	32 6
United Alkali, Ord. ...	27 0	31 3	30 3
United Glass Bottle Man., 7% Mt. Deb. Stk. £100	£85½	£85½	£83
Venesta, Ltd., Ord. ...	17 6	12 6	12 6
7% Pref.	17 6	15 0	14 0
Virol, Ltd., 7% Pref.	20 9	23 0	22 6
White (A. J.), Ltd., Ord. 10s.	4 6	6 6	6 9
White (R.), & Sons, 6% Pref.	13 3	13 1½	13 1½
Prefd. Ord. 10s.	4 6	5 0	5 3
Wright, Layman & Umney, 6% Pref.	19 6	19 4½	19 4½

Insurance Act Dispensing

Record of matters concerning Chemists' interests in the National Health Insurance Acts

Local Reports

ENGLAND AND WALES

Essex.—The quarterly meeting of the Insurance Committee was held recently, Mr. J. H. Burrows (chairman) presiding. The Pricing Committee forwarded the following particulars relating to prescriptions dispensed during the first quarter of the year:—

	1922	1923
Total cost	£3,895 1s. 4d.	£8,005 12s. 3d.
No of prescriptions	240,185	223,349
Average cost per prescription (ingredients)	4.24d.	4.16d.
Average cost per prescription (dispensing-fee)	5.65d.	4.56d.
Average cost per insured person	10.67d.	8.48d.

The Medical Benefit Subcommittee reported that they had various communications from the Ministry of Health in regard to the use of a single-form prescription book. The Ministry intimated that they were unable to approve forms not in accordance with the model form. The Ministry have been informed that the Committee have adopted the single form of prescription since March 1922, and that the Committee's present stock will, it is estimated, be sufficient for their needs until the end of 1924. A request of a doctor practising near Purfleet to be allowed to dispense for the insured patients living in that area, as the nearest chemist is three miles distant, was granted. The Subcommittee also stated that the Pricing Committee had called attention to the fact that prescriptions were issued by a doctor which were not signed by his own hand. The practitioner had explained the procedure adopted at his surgery. He will in future issue and sign all prescriptions himself, and the Subcommittee do not deem it necessary to recommend any further action. The report also stated that the circumstances connected with the supply of dressings by a chemist which were not in accordance with the orders nor with the requirements of the Drug Tariff, have been referred to the Pharmaceutical Service Subcommittee. The report was carried. The distribution scheme, which has been approved of by the Committee and the Panel Committee, contains the following provisions in regard to the supply and dispensing of drugs, etc.:—"Payment will be made to a practitioner in respect of the supply of drugs (with certain exceptions, which may be obtained from a chemist, or if supplied by the practitioner will be paid at Drug Tariff rates) necessarily or ordinarily administered by a practitioner, and drugs and appliances needed for immediate administration or application (as defined in the terms of service), at the rate of 1s. 3d. per annum for every hundred persons included in his list, other than those to whom the practitioner is required to supply all drugs and appliances." There were five additions to and three withdrawals from the list of chemists on the panel since the previous meeting.

Sheffield.—A meeting of the Joint Services Subcommittee, which considered two adjourned cases for independent analysis after hearing the chemists concerned, found that the prescriptions had been dispensed with reasonable accuracy and care, and decided to make no recommendation in each case. A chemist who was out of stock of a calico bandage and referred the patient to a neighbouring chemist, was cautioned and required to conform to the terms of service.

Smethwick.—At recent meetings of the Insurance Committee the Medical Benefits Subcommittee reported that test prescriptions had been found to be accurately dispensed. Further tests will be made in the near future. The following statistical data was supplied for the quarter ended March 31:—

Prescriptions dispensed.. ..	32,852
Cost of ingredients	£392 4s. 4d.
Cost of dispensing	£626 7s. 6d.
Average cost of ingredients	2.9d.
Average cost of dispensing	4.6d.
Av. no. of prescriptions per insured person	1.11

The Pharmaceutical Committee has received £8 5s. 11d. towards the administrative expenses of the committee for the current year, and this amount will be deducted from the chemists' accounts. The Finance and General Purposes Subcommittee reported that payments to chemists were as follows: February, £331 17s. 11d.; March, £354 8s. 4d.; April, £343 12s. 11d.; May, £330 7s. 8d., and recommended for June accounts, £280 4s. The Panel Committee have drawn the attention of one doctor to the additional expense incurred by prescribing aspirin powders instead of tablets.

Somerset.—At a meeting of the Insurance Committee, recently, it was reported that two chemists had retired from the panel and the names of two others had been added. It was also reported that for the quarter ended March 31, 1923, 57,689 prescriptions had been provided at a cost of £2,492 0s. 5d., the average cost being 10.37d., as against an average cost of 10.97d. in the corresponding period of the previous year.

Staffordshire.—At a meeting of the Insurance Committee on September 1, the Pharmaceutical Service Subcommittee presented their report respecting complaints concerning the dispensing of insurance prescriptions at a branch shop of a company. The complaints, which formed the subject of the inquiry, were to the effect that a prescription for a 12-oz. mixture was supplied in a 10-oz. bottle, labelled "three times a day" instead of "every four hours," and that medicine was supplied in a bottle which bore only the label of another firm who had previously dispensed a similar mixture. In a third case a prescription for a 12-oz. mixture was supplied in a 10-oz. bottle, and was paid for by the food and drugs inspector, who disclosed his identity. The managing director and qualified manager of the branch pleaded that the errors were due to mistakes made in the rush of business at a time when they were short-handed. The Committee regarded the case as a serious one, but in view of the fact that the managing director had expressed his deep regret, and further had given his assurance that there should be no ground for complaint in the future, they recommended the Minister be recommended to withhold a sum of £10. The recommendation was approved.

SCOTLAND

Banffshire.—At a recent meeting of the Insurance Committee a letter was submitted from the Scottish Board of Health intimating its decision not to press further the matter of excessive prescribing by certain practitioners during 1921, on the understanding that the Committee would take the steps which were in their power to deal with excessive and extravagant prescribing. Another letter from the same body suggested that inquiry should be made into the case of prescribing for the year ended December 31, 1922, by certain doctors whose value per form was 15.36d. on a panel of 539, and a cost per person on the panel was 31.05d. The matter had been investigated by the Panel Committee, which, on the ground that not a single prescription showed excessive prescribing, recommended that no action be taken. It was agreed that the matter be remitted back to the Panel Committee for fuller report.

Dundee.—At a meeting of the Insurance Committee, recently, a panel practitioner was fined £25 "for failure or neglect to comply with the terms of service." A complaint had been made that he had failed to visit a patient on his list, and a subcommittee who had investigated the matter declared the complaint proved.

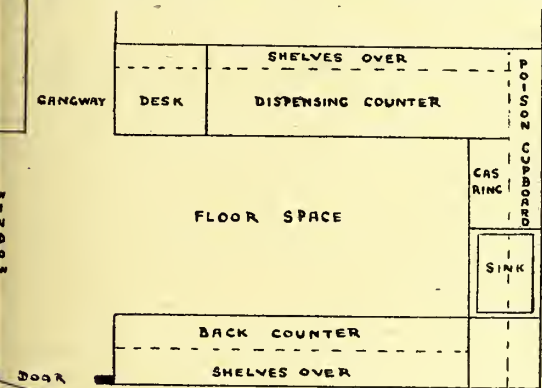
A FRUITLESS ERRAND.—A panel patient in the Midlands, on being given a three-inch bandage, inquired, "Is this all? The doctor told me to eat a lot of fruit."

THE AUSTRALIAN FEDERAL GOVERNMENT has applied the provisions of the Anti-Dumping Act to caustic soda from Great Britain and calcium carbide from Jugo-Slavia.

Dispensing Department Arrangements

THE arrangement of the dispensing department depends, like all other shopfitting, on two primary conditions, the size and plan of the pharmacy, and the class of dispensing to be catered for. In "Opening a Pharmacy" there are two illustrations of dispensing counters with descriptions of the arrangement of utensils and stock, either of which is very practical, but which, to my idea, are more adapted to what we call a private dispensing practice; whereas to-day the majority of pharmacists have to cope with rapid Insurance work, and it is with this point of view that I propose to deal. To start with, I may say that it should be taken as an axiom that a dispensing department for Insurance work should be so arranged that the dispenser can deal with the bulk of the scripts without moving (more than absolutely necessary) from the place in which he usually stands; and it is with this idea in view that I have designed my dispensary. It is a plan which has worked well in practice. I cannot do better at this point than repeat the recommendations laid down in "Opening a Pharmacy," as they hold good in every case:—

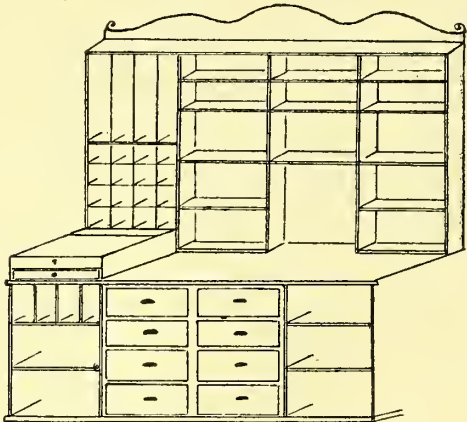
Plenty of daylight is conducive to clean work, and minimises the risk of errors.
There should be no thoroughfare behind the dispensing counter—that is, it should not be necessary to pass it in going from the shop to the house or cellar.
The apprentices should not put up stock nor the porter wash bottles close to the dispenser.
A position should be chosen which makes it impossible for customers to mistake the dispensing for the serving counter.
My first diagram shows the general lay-out of the department. The dispensing counter itself is 8 ft.



CROSS SECTION

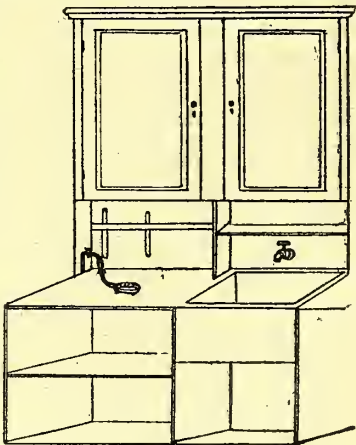
long by 2 ft. broad, and the edge juts out about an inch beyond the drawers beneath, to avoid trouble if liquids are accidentally spilt; for the same reason there is a wooden ledge about half-an-inch deep at the back of the counter for the bottom row of bottles to stand on. The desk is on the left hand, so that if a second assistant is writing labels he can help at the front counter as well, and does not have to pass the dispenser to do so. The desk is 2 ft. wide, with lift-up lid, and inside are kept the tariff list, C. & D. guide to D.D.A., one or two price lists, and other papers required for reference, while the bottom half of the desk has a label drawer, partitioned to contain labels and envelopes (prescription and powder); this is preferable to having the labels in a drawer into which liquids might run. The first row of shelves over the desk is converted into an open-label rack for labels required constantly—e.g., 3ss. d.s., 3ss. 4tis horis, The Lotion, The Liniment, Shake—and over this again are divisions for books, B.P., B.P.C., Hospitals Pharmacopœia, and so forth. The shelves over the dispensing counter are six in number, counting

the top and bottom as one each; the bottom and first shelves are divided in the centre to leave a space for the balance to be pushed back into, which is very convenient when room is required for pill or cachet machines. On either side of the balance on the bottom row is room for the label damper, powder folder, etc., on one hand, and on the other pill excipients and the like. On the next two half-shelves there are bottles for ready-made pills on the left and tablets on the right. On the next



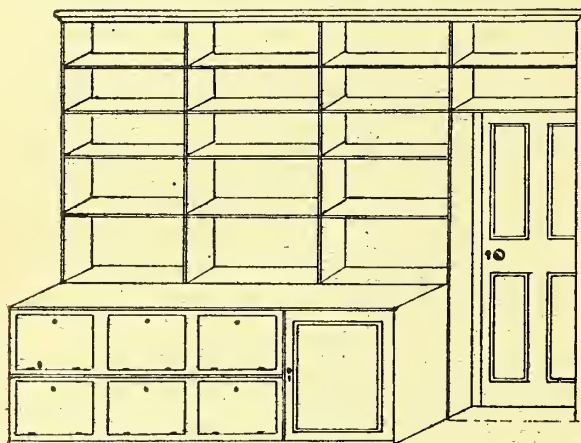
DISPENSING COUNTER

shelf there is a row of 6-oz. flats placed edgewise, and containing a representative lot of tinctures, concentrated infusions, waters, spt. am. aromat., spt. chlorof., ext. casc. sag. liq., and so on; above this is a row of 3-oz. W.M. bottles, with such powders as sodii bic., bis. carb.; and sodii bibor., and above that again a row of 1-oz. W.M. bottles for powders used in smaller quantities. The top shelf takes a series of 30-oz. rounds containing solutions—e.g., of pot. brom., and a few concentrated formulary mixtures in frequent request. On the edges of the shelves at intervals are screw hooks to hold stirring rods, pens, etc., laid along, and one or two hooks for paper clips to take finished scripts, or scripts held over, thus eliminating the untidy appearance caused by putting odd papers under bottles. Under the counter the space is divided into four equal parts, the two end ones being shelved and the centre two fitted with drawers, while the whole are raised from the floor to the height of a three-inch board to prevent dust. Under the desk are divisions for prescription-books, slid in edgeways; second shelf, evaporating dishes and funnels; third shelf, retort stand, kettle and ointment pan; the shelves at the other end hold, first, small mortars and pill mortar; second, infusion pots, jugs and ointment slab, stood on end; third, big mortar. The drawers suitably partitioned are utilised as follows:—(1) Corks; (2) chip boxes; (3) pill and powder boxes; (4) tools in front and rolls of plaster behind; (5) powder papers, filter and waxed papers; (6) cachets, paper cups; (7) small assortment of N.H.I. bandages and lint; (8) pill and cachet machines and suppository mould. On the right of the dispensing counter, against the wall, we have two



SIDE FIXTURE

cupboards, continuing the front-shop fixtures. one for poisons and the other for small-drugs, essential oils, etc. These cupboards finish off at a point, allowing convenient space for a rack for spatulas under one and for measures under the other; under the measures is the lead-lined sink with lead-covered splash-back—some pharmacies have the sink in the dispensing counter itself, but, although it is close handy, there is the objection of splashing the counter and the risk of things falling into it. The draining board is on the right, waste-paper box in the space beneath, while under the poison-cupboard, between the dispensing counter and the wall, is a metal-covered shelf with a gas point, to which can be fitted a gas-ring or bunsen burner as required. The back



BACK WALL FIXTURE

wall of the pharmacy is fitted with a run of the usual wall fittings, two of the shelves being continued over the door leading to the back premises. The top three shelves hold shop rounds for drugs not so often used as those on the dispensing counter; the fourth shelf down is filled with syrup bottles, glycerin, ol. ricini, etc., while the bottom row has large ointment jars for ung. zinci and other ointments in frequent use. Next comes a small counter, very handy when a big rush occurs, and having a spare pair of counter scales for weighing ointments and things too heavy for the dispensing balance. Under this counter are six lockers containing a full range of dispensing bottles, and at the end is a cupboard for small ointments and similar articles. The whole comprises a very handy and convenient dispensing department and one which works well, as everything required is within reach and there is no running about the pharmacy to fetch bottles or drugs during the rush hours in the evening. Scripts are hung up on clips as finished and sorted out and copied next morning; the solutions are made up and bottles filled from the stock room daily by the dispenser in a quiet time. The light should be conveniently placed.

A PATRICIAN HOBBY.—“Beachcomber,” in a recent issue of the “Daily Express,” makes excellent fun of the unworkable hints that sometimes find their way into the columns of the daily Press. He writes:—

A pleasant hobby for the practical woman of small means is scent-making. Take five or six thousand roses, soak them in a gallon of ambergris, shake round thoroughly, and throw away. Next take a dozen bottles of very old liqueur brandy, strain with the residue through a gold sieve (which any jeweller will knock together for a few score pounds) and allow to simmer over a quick fire. Then throw away the liquor and add to the remainder the dried petals of a thousand gross of violets. By this means from one to two half-ounces of delicate perfume is obtained after a few months' careful distillation. This, put into a well-cut glass bottle, may fetch as much as 2s. 6d. or 2s. 7d. in a good scent season. . . . In a good while year a clever woman will snap up any amount of ambergris at £500 per fluid ounce.

Pharmaceutical Botany

XXI. Recapitulation and Review

THE time is now ripe for a recapitulation of the simple yet fundamental principles underlying origin of plant structures such as can be deduced from previous articles. The ultimate object of each individual plant is to reproduce itself, otherwise extinction ensues. Variation and natural selection are the foundation stones on which nature slowly and surely builds her manifold types. Organs do not arise anew, but are produced by modification of pre-existing parts. Reduplication and reduction are important means by which strictures originate. Parts subjected to outside influences are most prone to change. Thus leaves and stems are plastic, but the well-protected ovary changes little. Since classification is based on natural relationships as indicated by resemblances, it is the slowly changing characters which are most useful. This explains the importance of sexual organs in taxonomy, as these are least susceptible to modification. Two main methods of reproduction can be distinguished—vegetative and sexual. The former perpetuates the protoplasmic peculiarities and characteristics of the parent organism modified only by environment. In sexual reproduction a variation of characteristics is greater as a new individual is reproduced blending those of two germ cells, and the offspring may resemble closely or differ considerably from either or both parents. Competition is Nature's method of selection, the strongest surviving when conditions favour growth. On the other hand, adaptation to circumstances otherwise unsuitable encourages development of new types. Practically every cell is reproductive in lower plants, growth being regulated by energy available in food material or light. The larger Thallophyta (compare *Fucus*) show distinction between vegetative and reproductive portions. A delay ensues in reproduction until vegetative development ensures ample food for formation of new (water-borne) germ cells. Aquatic existence calls for nothing more than this.

The *Mosses* illustrate a kind of half-way house in the evolution of a land flora. The (water-fertilised) moss plant itself (gametophyte) is capable of indefinite vegetative propagation. When this delay in sexual reproduction ends by formation of sexual organs the plant's existence also terminates in consequence, the new sporophyte generation dependent thereon draining it of all food material. The moss sporophyte is wholly reproductive (of air-borne spores). In the fern family this (land) sporophyte has become differentiated into stem and flattened (foliar) appendages or leaves, which are both vegetative (or assimilatory) and (later) reproductive. Note that spore reproduction ends the life of this form of leaf. Some ferns, such as the Royal Fern (*Osmunda regalis*), show distinction between vegetative and reproductive portions of the leaf. The gametophyte is tied to a precarious existence in casual water.

The first step in the success of the flowering plants was complete emancipation from aquatic existence by retention of the gametophyte (in the ovule) and fertilisation (of the egg) *in situ*, but equally important was the relegation of sexual reproduction to specialised shoots and development of a seed containing a new miniature plant (or embryo) supplied with sufficient food to ensure a new start in life under suitable conditions.

Such is the bare outline of the conditions which led to simple adaptations which influenced the formation of the great groups of plant life. Coincident therewith, division of labour proceeded apace. In flowering plants assimilatory functions devolve almost entirely upon the vegetative or foliage leaves. Increase in size and number of these leaves led to longer and larger stems, including branching thereof, while continued (secondary) growth enables them to persist from year to year. Full adaptation to land existence necessitated the development of a (subterranean) root system. Lastly sexual reproduction was relegated to specialised branches (or flowers) only. Resultant seed formation may terminate the life of the plant (as in annual and biennial plants) or only of the dwarf shoot

(or flower) itself, as in most perennials. Thus in higher plants the normal arrangements are: Root (to obtain water); stem (to support leaves and conduct food solutions from root to leaf and *vice versa*); leaves (assimilatory); and flowers (reproductive).

The prominence given to evolutionary ideas in these articles is intended to obviate the study of botany becoming unnecessarily barren and tedious. On an evolutionary basis comparison of plants becomes both instructive and illuminating. A sharply defined character common only to a number of species inevitably indicates a common ancestor, but this may become less distinct as it is modified by variations in offspring. Nevertheless, an important single character (enclosure of ovule in an ovary) will dominate and serve to identify a whole group of flowering plants (Angiosperms). Other characters usually associated therewith (such as arrangement in flower of stamens below carpels, the presence of true vessels in xylem), again go to show derivation from a common ancestor. Similarly, the separation of these true flowering plants into types with one seed leaf (or Monocotyledons) and two seed leaves (or Dicotyledons) must have taken place long ago. Both vegetative and floral characters differ sufficiently to identify the group without reference to the primary distinction.

Reviews of Books

A Treatise on Chemistry. By Sir H. E. Roscoe, F.R.S., and C. Schorlemmer, F.R.S. Sixth edition, revised by B. Mouat Jones and others. Vol. II., in two parts. 9 in. x 5½ in. Pp. 1565. 50s. London: Macmillan & Co., Ltd., St. Martin's Street, W.C.

Roscoe and Schorlemmer's chemistry is the largest work on the subject published in this country, and it is of special interest to find that the proprietors intend keeping it in the forefront of chemical manuals. Volume I. was revised by Dr. J. C. Cain, and published in 1920, and now appears Volume II., of which the last edition was dated 1913. The opportunity has now been taken to separate the volume into two parts, each being a bulky book, but more manageable than if the whole of the matter were included within a pair of covers. The index of the two volumes is given in the second part. The clear type and excellent paper which have always characterised this work are continued. The volume begins with historical notes on metals, then deals with atomic weights, valency, classification, atomic numbers, isotopes, alloys, solubilities, spectrum analysis, crystallography and other physical and theoretical considerations. The metals are then treated systematically, Part I. dealing with the first three periodic groups ending with the metals of the rare earths. The rest of the groups are continued into Part II., which ends with the radio-active elements. The influence of modernity is shown throughout; as an example may be mentioned the newer physics dealing with isotopes and atomic structure, and such items as quartz glass and stainless steel. The work of revision has been well carried out.

Chemistry: Inorganic and Organic, with Experiments. By C. L. Bloxam. Eleventh edition, by A. G. Bloxam and S. Judd Lewis, D.Sc. 10 in. x 6 in. Pp. 832. 36s. London: J. & A. Churchill, 7 Great Marlborough Street, W.1.

Bloxam's Chemistry was first published in 1867, and subsequent editions have gradually evolved into a one-volume encyclopædia of chemistry. The tenth edition was brought out in 1913, and was the first with which Dr. Judd Lewis was associated as co-editor. The first edition contained 630 pages, the tenth 878 pages, and the present edition 832 pages. The difference is due to the use of successively smaller type, so that the new edition probably contains twice the amount of matter that was contained in the earliest. The object has been to maintain the one-volume character of the work, which fits it for a student's reference work. It is unfortunate that the price has had to be increased from 21s. to 36s., but this we take to be an index of the rise in values of printing and publishing as a consequence of the war.

The work, after a short introduction on the laws of chemistry, takes the subject through the non-metallic groups. Then, before the metallic elements are dealt with, is a chapter of 70 pages dealing with general principles and physical chemistry. It is in this section that room has been found for the new theories on the structure of the atom, crystal structure, and an illustrated account by Dr. Judd Lewis of modern spectroscopy. As Dr. Judd Lewis is a recognised authority on the last-named subject, the student obtains information which is much more than generalities. After the periodic groups of metals have been considered, organic chemistry is introduced, this occupying about 250 pages. Aliphatic and aromatic compounds are grouped, which the authors state is the most convenient method in a book of this character. The condensation necessary where such a large amount of matter is required to be compressed into limited space has been well carried out, and reflects great credit on the authors in their endeavours to keep the work comprehensive and modern in outlook.

The Theory of Emulsions and Emulsification. By W. Clayton, D.Sc., F.I.C. 9 in. by 5½ in. Pp. 160, with 22 illustrations. 9s. 6d. net. London: J. & A. Churchill, 7 Great Marlborough Street, W.1.

The topic of this volume is so essentially pharmaceutical that one instinctively looks for the correct method of making emulsio olei morrhuae and so forth. However, pharmaceutical emulsions only find place as object-lessons, the so-called "Continental" and "English" methods being contrasted in favour of the former. In the Continental process four parts of oil and two parts of gum acacia are ground to a paste in a mortar; three parts of water are then added in bulk, and a thick creamy nucleus obtained by trituration, which is diluted at will. The first chapter deals with emulsifying agents. Clarke and Mann grade emulsifiers (using 1 per cent. solution in water for emulsifying benzene) as follows:—Egg albumen, 10; starch, 6; gum acacia, 5; dextrin, 3; sucrose, 0; with kerosene, the gradation changes to:—Egg albumen, 10; starch, 9; gum acacia, 3; sucrose, 2. Chapter II is concerned with the properties of emulsions, including limiting size of dispersed globule (order of 10.5 cm., or one micron), electrical charge (including the theory of the electric or Helmholtz double layer), and the vexed question of emulsion stability. Chapters III to VI are occupied with theories of emulsions. The basis of the modern theory of emulsions is a stable arrangement at the liquid—liquid (dimeric) interfaces, which is sound from a thermodynamic standpoint. This is largely the outcome of surface tension experiments. Thus oleic acid spreads on the surface of water to a film of monomolecular thickness with hydrocarbon chains packed side by side vertically above the COOH groups. Thus for two immiscible liquids an emulsifier will be adsorbed at their interface if this substance possesses molecular groups which will orientate some to one liquid and some to the other (e.g., COOH to water, and hydrocarbon residue to oil in the above example). The emulsifier must, in a sense, act as a bridge for the dissimilar liquids. Pharmacists have long known the ease with which acid oils emulsify; and though the new work will not alter pharmaceutical practice, it is a welcome addition in throwing light in dark places. Pickering's classical work on paraffin emulsions is given at some length; as also is the preparation of super or homogenised emulsions (notably milk) by pumping through the narrow space between the seat and valves of an agate homogenising valve which opens at a pressure of 2,000 to 3,000 lb. per sq. in. Finally, the important question of breaking down emulsions occupies the last chapter. This is a large industry in America, where there is electrical plant for dehydrating oil-field emulsions capable of dealing with 12,000 barrels per day of troublesome emulsion containing 40 per cent. of water. The author quotes some "very strange" phenomena in making and breaking emulsions—e.g., transit on an express train separated on oil-field emulsion which defied a centrifuge. The present work is an excellent survey and discussion of the problems. Its pages waste no space.

Prescription Problem

The Editor will be glad of the loan of original prescriptions suitable for this column, together with the solution of the difficulty.

The prescription problem set in our issue of August 4 brought a very large number of replies. It was as follows:—

Am. carb. ...	...	...	...	5i.
Tr. camph. co. ...	...	...	...	5j.
Tr. scillæ ...	...	...	...	5ij.
Liq. morph. ...	...	...	...	5j.
Tr. cinch. co. ...	...	...	...	5j.
Aqu[am] chf. ...	...	...	...	5iij.
3ss. evy. 4 h[ours]				

The following are the prize-winners:—

London.—Percy N. Turner, 2 Glendower Road, East Sheen, S.W.14.

Provinces.—R. H. Hothersall, 322-324 Union Road, Oswaldtwistle, Accrington.

Scotland.—John Dawson, 55 South Portland Street, Glasgow.

Ireland.—J. McGregor, 95 Main Street, Bangor, Co. Down.

Any one of the following books may be selected as a prize by the above-mentioned winners, who will please inform the Editor which one they prefer: "Chemists' Windows"; "Minor Experiences"; "Practical Methods of Urine Analysis"; "The Chemist's Dictionary of Medical Terms and Treatment"; "Provincial Hospitals Pharmacopœias."

The large percentage of correct replies received showed that the intentions of the prescriber were generally well understood. Accordingly, in making the awards, we had to give points for the degree of accuracy attained as well as to take into consideration the time of posting. The penultimate ingredient was rendered occasionally "Tinct card co" and "spt æth co," and a fair number of competitors read the directions as ex aqua 4 hourly.

London
Provinces
Scotland
Ireland
Am. carb.
Tr. camph. co.
Tr. scillæ
Liq. morph.
Tr. cinch. co.
Aqu[am] chf.
3ss. evy. 4 h[ours]

Our next problem is given above. Exact transcriptions of the prescription are invited on *postcards only*, which should reach "The Editor," THE CHEMIST AND DRUGGIST, 42 Cannon Street, London, E.C., not later than the first post on September 15. Prizes will be awarded at the discretion of the Editor, whose decision is final.

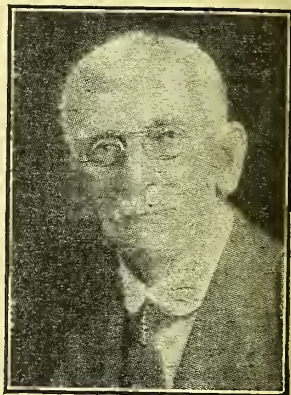
Personalities

BUT little personal news has been received, up to the time of going to press, concerning the great earthquake in Japan. It is reported, however, that some of the British staff of Lever Brothers, Ltd., are safe, and also Messrs. Devin & Challoner, members of the Yokohama staff of Brunner, Mond & Co., Ltd.

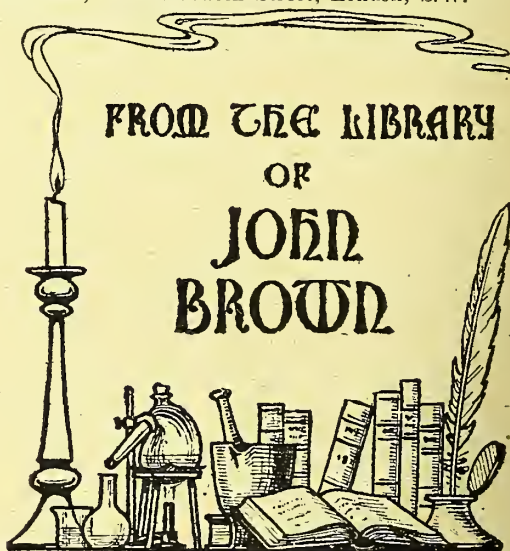
MR. F. W. MOORE, sundries representative of Evans Sons Lescher & Webb, Ltd., Liverpool, for Scotland and the Lake district, has just entered his forty-sixth year of service with the company. Mr. Moore is on holiday at Llyn-y-Pandy, near Mold, a beauty spot visited by Charles Kingsley and Mendelssohn. Liverpool, like London, has its records of long association in wholesale houses, and it is interesting to discover fresh instances.

At the luncheon of the Lincoln Rotary Club, on August 27, Rotarian H. Allison, chemist and druggist, read a paper entitled "A Pot-Pourri of Pharmacy."

A CERTIFICATE of naturalisation has been granted to Mr. Maurice Glusman (known as Mr. Maurice Glus), "chemist and pharmacist," 139 Warwick Street, London, S.W.



Photo] [Morgan
MR. F. W. MOORE



BOOK-PLATE OF MR. JOHN BROWN, PH.C., BERWICK-ON-TWEED.

MR. W. P. FERMOY has joined Griffiths, Terry & Ascanio, Ltd., 22 St. Mary Axe, London, E.C., as manager of the olive oil and essential oils department.

WE had a call the other day from Mr. R. McGeorge, Nairobi, British East Africa, who is on a visit to the home country. Mr. McGeorge comes from a land blessed with a minimum of legislation, the only problems for the pharmacist, apparently, being those arising from carrying on shops two or three hundred miles apart.

GENERAL regret will be felt at the illness of the Lord Mayor of London (Alderman E. C. Moore), who was guest at the opening reception given in connection with the recent meetings of the International Congress of Pharmacy and the British Pharmaceutical Conference. The Lord Mayor underwent an operation of a serious character on September 1; his condition is considered satisfactory.

Births

Notices for insertion in this column must be properly authenticated

SHORROCK.—At "Louvain," Chatsworth Road, Morecambe, on August 27, the wife of Arthur G. Shorrocks, drug store proprietor, of a daughter.

Marriages

CAMPBELL—MANSON.—At Lerwick Parish Church, on August 21, John Campbell, chemist and druggist, son of Mr. Campbell, architect, to Hilda, only daughter of Mr. T. Manson, proprietor, "Shetland News."

CRICHTON—LAUDER.—At Windsor House, Edinburgh, on August 22, David Macdonald, second son of the late Mr. Alexander Crichton, chemist and druggist, Leith, to Magdalene, only daughter of Mr. T. Lauder, 11 Gladstone Place, Leith

HARRISON—IVORY.—At All Saints' Church, Goodmayes, on September 5, by the Rev. Hector W. Reindorp, M.A., William Arthur, eldest son of Mr. T. A. Harrison, Ph.C., F.C.S., to Constance Victoria, eldest daughter of Mr. C. W. Ivory, Churston, Goodmayes.

TODD—CRAWFORD.—At Sandyhills United Free Church Manse, Glasgow, on August 28, James Prior, second son of Mr. J. P. Todd, Ph.C., 26 Annette Street, Crosshill, to Elizabeth Cumming, eldest daughter of Mr. Crawford, 671 Shettleston Road.

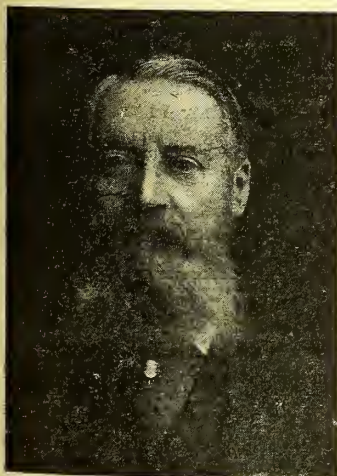
Deaths

ALEXANDER.—At a nursing home in Edinburgh, on September 1, Mr. Hugh Dalrymple Alexander, chemist and druggist, late of Lauriston Place. Mr. Alexander qualified in 1871.

DILLON.—On September 2, in a boating accident, on the River Shannon, Mr. Henry Dillon, M.P.S.I., Longford, son of Mr. James Dillon, J.P., Enniskillen, aged twenty-seven.

ELLIOTT.—At 61 Oak Street, Southport, on August 28, suddenly, Alice, the beloved wife of Mr. Stephen J. Elliott, chemist and druggist.

MUSPRATT.—On September 1, at his residence, Seaforth Hall, Liverpool, Mr. Edmund Knowles Muspratt, LL.D., aged eighty-nine.



DR. E. K. MUSPRATT.

Mr. Muspratt, who was born at Linares, Bootle, was the youngest son of the founder of the alkali industry, James Muspratt. His early education was obtained at the Pestalozzian Institute, Worksop, and in 1850 Mr. Muspratt proceeded to Gies-sen, where he studied chemistry under von Liebig, whose intimate friend he became. It had been his intention to continue his studies under Bunsen at Heidelberg, but on the advice of von Liebig he commenced in

1855 to assist his father in managing the Woodend and Liverpool works. He studied metallurgy in Manchester in the cellar of Richard Cobden's house, in which Owens College at that time was lodged. Early in his life Mr. Muspratt became an ardent free-trader, and, when

the French Government imposed a prohibitive tariff upon salt products, he was one of the two delegates (the other being Mr. Horace Gaskell) appointed by the alkali manufacturers to proceed to Paris concerning the matter. The result of this visit and a subsequent one was that instead of the proposed duty of 30 per cent. *ad valorem*, a tax of 15 per cent. was agreed on, to be reduced in 1864 to 10 per cent. It is of interest to note that Mr. Cobden, who was in Paris at the time, agreed to work with the deputation, and the support of firms engaged in the production of soap, glass and other trades to which alkali is essential provided the celebrated free-trader with evidence of very great value. Mr. Muspratt had a notable connection with the civic life of Liverpool. In 1875 he was elected President of the Liverpool Chamber of Commerce, and, two years later, entered the Town Council. The great Vrynwy water scheme was largely due to him. But perhaps his crowning achievement was the part he played in the foundation of University College, which is now Liverpool University. He was one of the first two pro-Chancellors, and was elected first President of the Council. The honorary degree of LL.D. was awarded him in 1907. Altogether his gifts to the university totalled £22,000, the most noteworthy being the building and equipment of a chemical laboratory. Mr. Muspratt was one of the founders of the Society of Chemical Industry, and was President during the year 1885-86. In his eightieth year Mr. Muspratt commenced an entertaining book of reminiscences, entitled "My Life and Work," which was reviewed at length in the *C. & D.*, 1917, p. 84. Unfortunately, Mr. Muspratt's eyesight began to fail him shortly after he had commenced to write it, and he was afterwards assisted by an amanuensis. In his early days he had met with many famous friends of his father, including Dickens, Lover, Sheridan Knowles the dramatist (who was the boy's godfather), Jerrold, Lemon, Forster, Charlotte Cushman the actress, and her sister Susan, who married Muspratt's brother. The interest in the theatre thus aroused remained with him all his life, as his book shows. Mr. Muspratt married, in 1860, Frances, daughter of Thomas Baines, a former proprietor of the "Liverpool Times." She died in 1910, leaving three sons and four daughters. The eldest son is Sir Max Muspratt, chairman of The United Alkali Co., Ltd., who was created a baronet in 1922, and the second son, Horace Muspratt, O.B.E., is a director of the company.

MCINTYRE.—At Hollyburn, Vancouver, British Columbia, recently, Mr. William McIntyre, senior director of Waller & Riley, Ltd., chemists, Bolton, aged seventy-one. Mr. McIntyre, who was a native of Wakefield, had some experience in early life as a chemists' representative. Nearly thirty years ago he joined Waller & Riley, Ltd., and on the death of Mr. Waller became senior director. He introduced the optical department, and was widely known and respected for his business acumen. The Bolton Chamber of Trade elected him President, and the appointment was a popular one. Mr. McIntyre was a man of many interests, particularly music. For some time he was choirmaster at Claremont Baptist Church, and Mrs. McIntyre was also well known locally as a gifted musician. In April Mr. McIntyre left home on a visit to his brother in Vancouver; although he suffered from asthma, death was unexpected. He will be much missed in the town and district.

MICHELL.—At St. Austell, on August 15, Mr. Samuel Clase Frederick Michell, chemist and druggist, aged sixty-three.

Wills

MR. JAMES FREDERICK GRIFFIN, 95, Starling Road, Edgbaston, Birmingham, chemist and druggist, who died on May 24, left property of the gross value of £7,820 4s. 6d., of which £3,356 7s. 1d. is net personalty. He leaves to his widow, Mrs. Florence Matilda Griffin, the whole of the property absolutely.

Trade Notes

MALT EXTRACT WITH OIL.—A special offer of malt extract with cod-liver oil is made in this issue by the Primo Drug Co., Ltd., 5 Bury New Road, Manchester.

PARTICULARS of the Chemists' Exhibition to be held in Glasgow on September 17-21 will be found in the advertisement pages of this issue.

HARKNESS, BEAUMONT & Co., Junction Bridge, Leith, Edinburgh, call attention, elsewhere in this issue, to the variety of styles in which they supply malt extract and malt extract with oil.

LIQUID PARAFFIN, B.P.—"Specialty" liquid paraffin of a guaranteed s.g. of 0.890 at 15.5° C. is the feature of the advertisement of the Anglo-American Oil Co., Ltd., Albert Street, London, N.W.1.

"GRIPS" PASTILLES.—We are asked to state that the first line of cost and profit items in the advertisement of "Grips" first-aid pastilles in our last week's issue should read: "5-lb. tins or jars cost you 11s. 6d. each," etc.

THERMOGENE.—The Thermogene Co., Ltd., Victoria Embankment, London, E.C.4, advise, in their advertisement, early ordering of Thermogene for the coming season. Window-display terms show a good profit, and the retail price is protected.

PY-SHAN POINTS TEA.—Thomas Christy & Co., 4/12 Old Swan Lane, E.C.4, call attention, on another page, to the fact that another sampling distribution of Py-Shan Points tea is just being begun. A supply of samples is always available, and the tea is sold exclusively through chemists.

CORKING MACHINE.—On another page appears an advertisement of the "Miniature" corking machine, the manufacturers of which are L. Lumley & Co., Ltd., The Minories, London, E.1. With a total height of only 20 inches, it has a capacity up to 100 dozen an hour, and can be adapted for various sizes of cork.

GERMICIDAL DOG SOAP.—The Hygienic Research Co., Ltd., 100-106 Moorgate Station Chambers, London, E.C.2, are now putting up their germicidal dog soap in attractive flat tins retailing at 9d. (6-oz.) and 1s. 6d. (18-oz.), in place of the former cylinders. A profit of 33½ per cent. is protected (P.A.T.A.), and special terms are offered on another page for small window-show parcels ordered direct.

"TIME-SWITCH" LIGHTING.—The British Electrical Development Association, Inc., 15 Savoy Street, London, W.C.2, advocate, on another page of this issue, the systematic lighting of shop windows after closing time. For eight months in the year, they urge, the evening stroller will turn towards the best-lighted streets; and by means of a clock switch electric light can be turned on or off at any hour.

EVANS' PASTILLES.—Evans Sons Lescher & Webb, Ltd., Liverpool and London, are offering (as will be seen on another page of this issue) a decorated window-screen (4 ft. x 3 ft.) with bonus of thirteen to the dozen for displays on orders of twelve dozen and upwards, which may be taken in two deliveries. These quantities show an excellent profit and relate, it may be recalled, to a widely advertised article.

CALENDARS AND CHRISTMAS CARDS.—We have received from Raphael Tuck & Sons, Ltd., Raphael House, Moorfields, London, E.C.2, a representative parcel of samples of the new calendars, Christmas cards, picture postcards, gift books and other stationery for the coming season. Pride of place must be accorded to the replicas of the Royal Christmas cards, printed by permission from the originals ordered by their Majesties and other members of the Royal Family. Passing to the general selection, we are struck by the high average level of artistic achievement. The "Pot Pourri" series is agreeably (and not too highly) perfumed; the cards suggesting old-time samplers are specially dainty; and the topical cards—e.g., the one inscribed "Broadcasting Happiness"—are uncommonly clever. Wall calendars in many styles

well maintain Messrs. Tuck's reputation in this department, and postcards are of the customary variety and excellence. There is also an extensive choice of illustrated books and painting books for children of all ages: in this connection it is worthy of mention that illustrated editions of Aesop's Fables and "The Water Babies" have lately been added to the juvenile libraries of the House of Tuck. "Father Tuck's Annual" has reached its twenty-sixth year, and it is one of many well-established features in the "World's Art Service" of which the producers are justifiably proud.

Business Changes

MARTYNS STORES, LTD., chemists, Wolverhampton, will shortly open a branch at 179 Lea Road, in that town.

MR. R. G. EACOTT, chemist and druggist, has taken over the pharmacy at 4 New Street, Sandwich, formerly carried on by Mr. T. Laurence.

MR. T. BELLAMY, Ph.C., 2 Tindal Square, Chelmsford, will shortly open a branch pharmacy in Moulsham Street, where he has purchased new premises.

MR. G. N. E. HUGHES, chemist and druggist, has taken over the Rexall Pharmacy, Lymm, formerly carried on by Mr. Edward N. Owen, chemist and druggist, who is retiring.

HANDELSVEREENIGING VAN DUDOK DE WIT & Co. EN MATTHES & BORMEESTER, Amsterdam, inform us that Mr. A. B. C. Dudok de Wit has become a general partner of the firm. The collective procuration given to F. J. A. van der Wouden and H. Gerth remains in force.

Gazette

Partnerships Dissolved

BULLEN, G. W., and **GLOVER, C. C.**, 57 Market Street, Ashby-de-la-Zouch, chemists, druggists, and insurance agents, under the style of Bullen & Glover, as from December 31, 1922, the business to be carried on by C. C. Glover.

Coming Events

This section is reserved for advance notices of meetings or other events. These should be received by Wednesday of the week before the meetings, etc., occur.

Saturday, September 8

The Confectioners' and Allied Traders' Exhibition and Market, Royal Agricultural Hall, London, N.1, 10 a.m. till 5 p.m.; and daily, until September 14, until 8 p.m.

Tuesday, September 11

Glasgow Pharmacy Club.—The Rambling Section will proceed to Balgray. Meet at Spiers' Bridge at 3.15 p.m. Leader, Miss M. Bain. The Bowling Section will play a rink game on Bellabouston Green at 2.45 p.m.

Wednesday, September 12

Manchester Pharmaceutical Golf Society, Withington Golf Club, at 2 p.m. Mr. J. H. Blyton's prize.

Information Department

INFORMATION WANTED

Postal or telephone information with respect to makers or first-hand suppliers of the undermentioned articles will be appreciated:

M/258. Antineurasthin	S/39. Hodgson's beauty preparations
L/178. Balena for the hair	W/309. "Posne" brand meta bi-sulphide of potash
S/178. Berset shaving brushes	L/258. Sovereign drops for horses
W/308. Delysia powder puffs	S/69. "Velvet Cling" cream
P/208. Dr. Watson's stramonium cigarettes	
S/208. La Blossom liquid rouge	

Appreciation

Many thanks for the trouble you took over my inquiry. I have secured exactly what I wanted. This shows that one can rely on prompt and accurate attention from the C. & D. —D/188.

Observations and Reflections

By Xrayser II.

British Pharmacists

will sympathise fully with their South African brethren in their opposition to the demand for the disclosure of the formulas of secret remedies, and will be glad, though our own opposition to the proposal when made here has already proved successful (at least for the present), of the convincing statement of the case against it made by Mr. Arderne, Mr. Low, and Mr. Hill. The cumulative effect of their remarks is overwhelming: disclosure would be fatal to the original proprietors' interests, if not to the industry itself, and would be such a piece of injustice as no other class of inventors has ever had to submit to. I am, as I have frequently stated, no particular friend to secret remedies; but candour compels me to admit that they fill a place not easily supplied in any other way, and I do not see how the disclosure of these, any more than of other trade secrets, can be logically or justly defended. The trade in them is no doubt open to abuse; but use, not abuse, is the rule, and the proved exceptions are too few to be given any important weight. Until medicine becomes an exact science, and while so many reputable practitioners prescribe these remedies, it is idle to object to the principle of secrecy, and existing safeguards against its abuse are all that is practically necessary.

One Point,

however, in Mr. Arderne's argument against disclosure is more than disputable. Beecham's Pills, surely, could not be sold as Beecham's, even if the formula were universally known, the case of Liebig's extract of meat notwithstanding. Liebig was not the proprietor of the original extract, and one firm has as much right to use his name as another. A better analogy to the case supposed is afforded by chlorodyne. It was decided that this, though an invented name, could (not having been sufficiently protected) be used by anybody; but nobody could use, or presume to use, the name of Collis Browne in connection with it, except the original proprietors of chlorodyne. I am speaking from a general impression, and may be wrong in some minor particular, but the broad fact remains. It is, however, not enough to invalidate the argument against disclosure.

The New R.P.U. Service,

the testing of private dispensing, is open to the criticism I have from time to time made against other services offered by the Union—it costs more than it ought to do. It is sufficient to compare the charge made per prescription with that The City Laboratories are prepared to accept for the same service, viz., 2s. 6d. (see *C. & D.*, August 11, p. 260). Of course, this is not remunerative, and the conditions on which the service is offered are not quite the same in both cases, but the difference between 2s. 6d. and 10s. is startling. Work which a private firm can afford to do at 2s. 6d. as a matter of business ought not to cost four times that amount when undertaken by a public body which exists for the benefit of its members. I suggest that the R.P.U. should arrange with The City Laboratories to do this work for them. Possibly they might then be able to serve their members at something like half their present figure, which, considering the very restricted scope of the service, is quite as much as it is worth. The "accuracy or otherwise" (to use the rather loose language of the R.P.U. circular) could not be ascertained with any certainty by the occasional analysis of such very simple prescriptions as those indicated.

A Question

of some interest is raised by the statement in Mr. Cameron's article, "Purchasing Drugs for China," that United States and German wholesale houses are able usually to execute orders in two-thirds of the time required by English houses. As the delay occasioned by the Chinese Customs authorities is the same in all cases, we are driven to the conclusion that the fault lies with

us—that we may be less efficient, or at least more dilatory in our methods than our foreign rivals. Dilatoriness in such affairs is a form of inefficiency, and must operate injuriously against those who can rightly be charged with it. There may be circumstances of which nothing is said by Mr. Cameron which in part account for the facts, yet one cannot but fear that the true explanation is our national habit of taking things easy. "Slow and sure"; "fair and softly"; "more haste, less speed"; these proverbial phrases are too frequently in our mouths to be without significance in this connection. It is a matter that must be amended if we are to compete successfully with our foreign rivals.

Organotherapy

and other new remedies apart, I doubt very much whether, as seems to be implied in your article on the subject, the art of prescribing has been sensibly improved by the National Insurance Act. We saw, it is true, so few prescriptions from the general practitioner before the introduction of the Act that comparison is difficult; my acquaintance with panel practice is, moreover, almost *nil*, and I cannot therefore speak positively, but, although there has no doubt been an improvement in the form of prescriptions among men who formerly wrote but few, I question whether therapeutically there has been much advance, and I should very much like to hear the opinions of chemists with a larger experience than my own. What I specially doubt is whether greater care is taken to fit the remedy to the supposed complaint, whether, except from the economical point of view, the prescribers, as a rule, "think more" about what they order. And the economical view hardly, it seems to me, makes for good prescribing. It was, of course, always a factor with those who dispensed their own medicines, but it is so still.

Holidaying

recently in the neighbourhood of Wotton, the seat of the Evelyn family, I beguiled the tedium of a few wet days by dipping afresh into the famous Diary of John of that ilk. John Evelyn does not in his own person and character appeal to us so intimately as his brother diarist, Pepys; he is too staid and sober to be particularly interesting, and he lacks that engaging frankness by which Pepys wins our hearts in spite of his frailties and loose living; but one cannot turn over half a dozen pages of his diary without lighting on many interesting things, and on some that are peculiarly so to anybody who, as every pharmacist should be, is already interested in inquiries into natural phenomena of any kind, especially such as have any bearing upon our calling. Evelyn was a member of the Philosophic Society out of which the Royal Society grew, and one of the founders of the latter. He was a personal friend of Robert Boyle, Sir Kenelm Digby (whom, however, he calls an "arrant mountebank" and a "teller of strange things"), of Sir Thomas Browne, and of many others of those who were then more or less directly making modern science possible. The entries in his diary are sometimes provokingly brief, but they rarely fail to shed light on some points of importance.

A Country Newspaper

sent to me the other day has a paragraph on this year's unusual profusion of "marguerites" or the railway and canal banks. I, too, have noticed this, but the flowers referred to are, properly speaking, not marguerites, but *maulinworts*. They are named after St. Mary Magdalene, not St. Margaret of Cortona. Her flower is the little daisy of our fields, *Bellio-perennis*, the *Herba Margarita* of our old herbalists, and I do not like to hear it robbed of its name by the big ox-eye daisy as is now the custom. The French seem to have been the first offenders in this matter, though their "Margarite" is, I believe, not *Chrysanthemum leucanthemum*, but *C. frutescens*. Anciently it was the little daisy they called so, the flower adopted as a device by St. Louis in honour of his queen, by Marguerite de Valois, and by other later Marguerites of French history. It is, too, these little daisies that Shelley, playing in fancy with the name Margaret, calls the "pearled Arcturi of the earth." Why the transference of the name, and when it was first made?

CHESTNUTS

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PATENTS AND TRADE MARKS.

There are many worrying difficulties to be overcome in connection with the Registration of Trade Marks and the grant of Letters Patent which members of the Retail and Wholesale Drug Trade can avoid by consulting efficient agents who would undertake all the trouble for an inclusive fee and obtain protection in the United Kingdom and abroad. Advice in the first instance free. Pamphlets gratis.

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Editorial Articles

Japanese Produce

It is only natural that so sensitive and speculative an article as menthol should be one of the first to feel the full effect of the Japanese calamity, and it can safely be said that never in the history of the drug has the market been so wild and rampant. It is common knowledge that the bulk of the spot stock in London, which may be estimated at from 200 to 300 cases, has been well concentrated for some months past, and as consumers have hastened to cover their requirements full advantage has been taken of their neediness, and particularly in the middle of the week the price advanced almost hour by hour. Previous to the earthquake, menthol in Mincing Lane was a dull market at about 38s. 6d. per lb., but since Friday last it has risen by a series of rapid advances to 60s. per lb., with sales at many intermediate prices. The future of menthol is quite uncertain and complicated by unknown factors, as at the time of writing there is an absence of definite news. It is generally known that three of the principal manufacturers were located in the Yokohama district, and on August 28 advices were received that the stocks in Yokohama consisted of 1,500 cases menthol and 1,500 cases mint oil. The inference is that these stocks have been destroyed, but the question arises: Would the Japanese, with an intimate knowledge of the volcanic nature of their soil, concentrate all their stocks at Yokohama? On the other hand, Kobe, in the Southern Island, is the chief port of shipment, and here the stocks should be intact. Formerly 75 per cent. of the entire crop of mint in Japan was grown in the Kobe district (Bizen, Bitchu and Bingo), but Hokkaido in the north, where the crop is cut in November, is now the chief centre of cultivation, and this is some five hundred miles away from the centre of the disturbance. All prices for forward shipment were withdrawn early in the week, so that consumers can only depend on spot stocks, and it is doubtful if contracts for forward shipment will be carried out, as shippers will no doubt claim *force majeure*. Although the United States carries a much larger and more widespread stock than London, and has been the chief importing country, little relief can be looked for from that quarter unless the goods could be shipped in bond, as the import duty on menthol in the United States is 50 cents per lb., and hitherto the possibility of re-export to Europe has been out of the question. As regards Japanese dementholised mint oil, a similar rapid advance has taken place to that of menthol. Naturally sellers make the most of the position, and intimate that there is little stock here. Prior to the disaster the spot price of the leading brands was 7s., but by Tuesday it had risen to 9s. per lb., and on Wednesday 10s. to 10s. 6d. had been paid. Of less effect has been the rise in Japanese refined slab camphor, which market had been very sluggish and disappointing throughout the year, with a comparative absence of Continental demand for the usual fifty case lots. Stocks on the spot had

therefore begun to accumulate, and by the end of July attained about 2,500 cases, but the news of the Japanese disaster has put a much rosier complexion on the market, and holders, who were confronted with losses, are either liquidating without a loss or making a profit, as spot prices have advanced fully 6d. to 7d. per lb., closing on Wednesday with spot sales at 4s. to 4s. 3d., and 4s. 6d. asked at the close. English refiners have not yet made any change, although they have been freely selling for some time past. Japanese vegetable wax, which has long had an easy undertone, has slightly appreciated, but there is a stock of about 800 cases to keep consumers going. It is felt that agar agar (Japanese isinglass) is already sufficiently dear, as there seems little room for much higher prices, the consumption having fallen considerably. Insect flowers are quite a minor product, and no change is indicated.

War Medical Services—II.

THE supply of dressings, clinical thermometers, x-ray outfits, dental requisites and spectacles to the Forces, as outlined in the official "History of the Great War," was referred to in our issue of September 1 (p. 330); the volume from which our information was derived also contained references of equal interest and importance concerning drugs, chemicals, serums and vaccines, and has been followed by others in which the pharmacist may profitably delve. With regard to drugs, the History points out that at an early stage of the war British manufacturing chemists were encouraged to increase their production of coal-tar derivatives and fine chemicals, while "ether and chloroform for anæsthetic purposes were required in such enormous quantities that the Customs authorities were approached and special facilities were granted to the limited number of manufacturers of these drugs for augmenting their plant in order to increase the output to meet requirements." The principal general anæsthetics used were methylated ether, methylated chloroform, ethyl chloride, and nitrous oxide gas. "Notwithstanding the statements to the contrary, which appeared in the public Press and elsewhere, at no time was there any shortage. . . ." The total quantities of ether and chloroform issued during the five years 1914-19 were 413,198 lb. and 249,341 lb. respectively. The demands from France for ether amounted at one time to 3,000 lb. a week. A higher standard for ether and chloroform than that usually required by civil hospitals was deemed necessary, and it was decided that two tests for purity should be demanded, in addition to those of the British Pharmacopœia. In 1917 the demand for nitrous oxide and oxygen rapidly increased, and some difficulty was experienced in obtaining sufficient steel cylinders. More than 14,000 oxygen cylinders and 8,000 nitrous oxide cylinders were in circulation by the end of 1917, and in the following year another 7,500 cylinders for oxygen and 3,000 for nitrous oxide were purchased. "The provision of oxygen as a therapeutic agent for use in the Army during the war was never," we are told, "on a thoroughly satisfactory basis." The weight of the cylinders was a serious disadvantage from the point of view of transport, and there was often waste of the gas arising from want of knowledge. Dr. J. S. Haldane, Oxford, devised an apparatus to control the flow and measure the quantity for administration; but eventually it was decided that the best solution was the provision of liquid oxygen in vacuum containers. By this time, however, the signing of the Armistice put an end to the urgency of the problem. Quinine receives a paragraph to itself in chapter nine: we learn that in 1916 the total

issues of its salts exceeded twenty-one tons (equal to 66,000,000 5-gr. doses), while during the early part of 1917 the average monthly supplies amounted to about 12,500 lb. At various periods forty tons was requisitioned in this country and 30,000 lb. was obtained from India. The total of the compressed tablets of various drugs during the war is given as 1,080,000,000; it is not stated whether this figure includes tablets of quinine salts, though we are informed that it is exclusive of hypodermic and ophthalmic tablets. The quantity of vaccines supplied amounted to 34,126,165 c.c., of which over 24,000,000 was for typhoid and paratyphoid. In all twenty-four varieties of vaccine were prepared, practically all of them being manufactured in the Royal Army Medical College. Upwards of 12,000,000 doses of various serums were also issued, 11,000,000 of which were anti-tetanic serum. In view of the experience gained, the use of anti-tetanic serum as a prophylactic was greatly extended as the war proceeded; and, in addition, 190,000 ampoules of serums for gas gangrene were prepared, comprising antibodies to *B. Welchii*, *Vibrio septicus* and *B. tetani*. The bulk of these anti-gas-gangrene serums, however, were not ready until the eve of the Armistice. The chapter continues:—

Early in the year 1918 arrangements were completed through the Medical Research Committee for the provision of anti-endotoxic meningococcus serum, prepared at Cambridge, for the treatment of cerebro-spinal fever This supply was in addition to anti-meningococcus serum provided by the Lister Institute for issue to the overseas forces. For the treatment of influenza cases in the army, 10,046 phials of a special anti-streptococcus serum were issued, in the production of which cultures were employed prepared from strains isolated from actual cases of influenza occurring in France.

The steps taken to secure uniformity in the use of the Wassermann reaction and the satisfactory results obtained from Dakin's solution also receive passing mention. The number of capsules of calomel cream issued for Army use up to the end of October 1919 was over 5,000,000. Concerning glassware, we read that "the Optical Munitions Glassware Department of the Ministry of Munitions organised the trade and undertook to supply the medical services with the glassware necessary to meet requirements. Although delays occurred and to a certain extent inferior substitutes had to be accepted, an adequate and regular supply was maintained and no serious shortage was experienced." The system of payment evolved is dealt with partly in the text and partly in a footnote; and, in this connection, the services of Mr. W. J. Uglow Woolcock are referred to. It appears that an annual average of 48,000 contractors' claims was dealt with, that there were eighteen contract ledgers and one invoice book, and that the staff of the cash accounts section numbered twenty-three, "nearly all of whom joined the medical department of the War Office without previous experience in accounting." Lack of experience would seem to have been a virtue, for the next sentence on page 186 reads: "The majority, too, had no office training, and it is much to their credit that the work of accounting was so accurately performed." We are led, indeed, to infer that a considerable saving of public money must have resulted from their labours, for the story continues: "The system of ledger keeping for cash accounts adopted was so complete and satisfactory that it was made use of by the Finance and Audit Branch of the War Office, who found it unnecessary to keep a similar record in their branch." Chapter nine ends with a reference to adventitious help given to the civilian population in various countries. Drugs and dressings were issued free to the civilian population in

areas occupied by the First, Second and Third Armies in France, 245 patients being treated daily in the first-named area at one period, at the modest cost of about £4. In addition, medical stores valued at £55,738 were supplied to Russian civilians in 1918, and in 1919 packages of similar supplies worth about £4,500 were sent for the use of civil hospitals in Vienna and Budapest. Appendix E VIII. of the first volume of the General History discloses the fact that 2,023 testing cases for the detection of poisons in drinking water were issued for use in this country, 3,480 were sent to France, 191 to Salonika, 6 to Malta, 294 to Russia, 781 to Egypt, 6 to India, 43 to South Africa, and 70 elsewhere. From another table we learn that directions were issued indicating the procedure for detecting certain metallic poisons (including cyanides) and strychnine. Table E XXIV. gives a list of fifty-three "Army Council Instructions regarding Economy and Prevention of Waste in the use of Medical and Surgical Supplies and Equipment," beginning in 1916 and terminating in 1919: the result of these exhortations does not appear to have been tabulated. Turning to Volume I. of "Diseases of the War," we find little of direct interest to pharmacists in the discussion of the etiology, symptoms and prognosis of the diseases that came under observation; but occasionally we meet with an experience of general applicability. Of such is a passage in the chapter on scurvy. It appears that in Mesopotamia the lime juice supplied up to the end of 1916 had no antiscorbutic value for the men who were under treatment: it usually arrived there after a long journey, and was probably at least six months old before issue. On the suggestion of Colonel (now Sir William) Willcox, fresh lime juice was prepared in India, 5 per cent. of alcohol and a little salicylic acid (2 gr. to a pint) being added as preservative. This gave better results, and after the occupation of Baghdad a similar preparation was made locally. According to recent investigations, however, lemon juice is superior to lime juice as an antiscorbutic. In a paper by Miss A. H. Smith, to which reference is made, it is stated that "lime juice" was introduced as a ration for the British Navy in 1804, but that up to 1875 lemon juice was issued under this name. Since then true lime juice from the West Indies has been supplied. Experiments carried out by Chick, Hume and Skelton indicate that tamarind, cocum and mango fruits have "a definite but small antiscorbutic value." To this general summary of points of interest in what promises to be a valuable, and within its limits a complete, record should be added the fact that in its opening volume there is an acknowledgment of "the loyal and patriotic support of the manufacturing and contracting firms" in helping to maintain adequate supplies of medical and surgical stores.

The Spurt in Shellac

Discussing market prospects in shellac in our issue of May 26 (p. 738), when the spot price of usual standard quality of TN orange was about 280s. per cwt., we suggested that there was room for a further decline under the more-cautious trade demand and the possibility of an increase in the London stocks. Since then and until quite recently the market fluctuated chiefly downwards, with the spot price falling to a little under 260s., while forward positions dropped at one period to below 240s., but a sharp spurt has occurred lately to nearly 280s. The spot value at the close of last year stood at 375s.

per cwt., so that at about the lowest level above mentioned the total setback represented 115s. The extreme points recorded within 1922 were 397s. 6d. and 250s. on the spot. The position of shellac has therefore aroused more attention over the end of August, but it is rather obscure, and for the moment chiefly dominated by the agitated state of the Calcutta market, where a tug of war has been taking place between large interests. There has been a little revival of speculative interest in forward positions of October and December at this end. It appears that new buying and repurchases by short interests were impelled by the unusually sharp running up of the Calcutta quotations to about 140 rupees, thus representing a recovery of some 20 rupees from the lowest level reached last month. The bullish appearance of the primary market was quickly reflected here, although it seems rather curious that this development should have occurred coincidentally with a very marked increase in the London warehouse stocks by roughly 4,500 cases, this being by far the largest amount of shellac put into stock for some considerable time past. This very striking change in the London statistical position had been quite expected, as pointed out in our market columns recently, and it is somewhat surprising that this has had little or no counteracting effect so far on the aspect of the market. C.i.f. costs were lifted so smartly last week as to make dealers more circumspect as to the shouldering of new risks on the short side in face of the more animated demand on speculative account and the considerably improved run of inquiries for spot parcels. Possibly some little difficulty is being experienced at Calcutta by dealers in securing deliveries to cover contracts for shipment. In consequence of the greatly increased home stocks, it is obvious that the premium on spot delivery has been reduced to less extravagant dimensions, and it now amounts to about one-half what it was when the market was dominated by scarcity. Within recent months the deliveries into consumption suffered a notable setback from the returns in the early months of this year, partly due to the lack of confidence in the stability of the market, which under steadily increasing arrivals induced holders to meet buyers in order to lighten stocks. America has taken decidedly more interest in the market within the last month or so, and has again absorbed quite heavy quantities from Calcutta direct since Midsummer. This tended to pave the way for an upward reaction. The London landings this year to the end of August amounted to well over 50,000 cases, or an excess of about 10,000 cases compared with the same period last year. A very striking feature has been the rapidly mounting up of the deliveries for August to over 6,300 cases, against the paltry total of 2,337 cases for the previous month. The returns for August, we find, denote an excess of close on 1,600 cases over the monthly average so far this year, which represents about 4,740 cases. Even this average for the last seven months is only slightly below that for the whole of last year, which amounted to 4,769 cases. This would at least indicate that consumption has been well maintained on balance, at a rate appreciably above the pre-war level, notwithstanding the much higher cost of the product. Under the very low prices that ruled in 1912 and 1913, or in two years which preceded the war, the monthly average of the London deliveries worked out at 3,819 and 4,254 cases respectively. With the rapid depletion of the very large surplus stocks over and since the war period, market conditions were abnormally stringent

but the more important rate at which reserve stocks have been increasing in the course of this year is apt to render the market very sensitive whenever there is a lack of shipping orders at Calcutta under an abstention of American demand. The figures given below convey some idea of the much easier statistical position to date compared with the four previous years.

	CASES			
	1923	1922	1921	1920
Landings, Jan.-August ..	50,306	40,414	34,488	33,136
Deliveries, Jan.-August ..	37,975	38,697	30,245	33,691
Stocks at end of August ..	16,597	12,766	16,466	14,152

At one period last year the London stocks were under 6,000 cases, and the latest returns, it will be seen, amount to 16,597 cases, which is now in excess of the figures at the same date two years and three years ago. On the other hand, it will be seen from the above figures that the landings make a conspicuous showing, being for the seven months far in excess of those for the three previous years. The deliveries cannot go on for very long at last month's heavy rate, and unless there is a marked setback in new supplies conservative views of the market at the still very high prices would seem justified.

Coco de Macahuba

A CONSIGNMENT of fruits from Brazil described as Coco de Macahuba has recently arrived in London. This name is given in Brazil to the fruit of three nearly allied palm trees belonging to the same family as the coconut palm and known to botanists as *Acrocomia sclerocarpa*, Mart., and its variety *Wallanana* and *Acrocomia intumescens*. The first is commonly called "Coqueirode Catarrho," the second "Mucuja," and the third "Macauba mirim," to distinguish them apart. The first of these is the most important and is widely spread in South America. The fully developed fruit is about 5 cm. in diameter, rounded oval in shape, has a hard epicarp, a rather sticky fibrous sarcocarp, and a hard endocarp containing an oily seed. The chief value of the fruit is in the oily seed, which, according to Peckolt, yields 59.459 per cent. of a colourless fixed oil of specific gravity 0.909 at +13° C. In the purified state this oil is used for culinary purposes and in the crude state for soap-making. The sarcocarp or fleshy part of the fruit yields only 1.809 per cent. of an oil which is used as an embrocation for neuralgia and headache. The fresh sarcocarp has an agreeable odour like that of the peach, and is used to form a cooling drink called "macaiba," but boiled with water the pulp forms a thick kind of gruel used as food, due to the 7.988 per cent. of starch it contains and 7.782 per cent. of saccharine matter, besides mucilage and albuminous substances. The green leaves yield a white silky fibre known as "Leda vegetal," or vegetable silk, and the petiole and leaf rachis is used in making baskets. It is doubtful if it would pay to import the fruits on account of freight, but the oil, if imported at a price to compete with other oils, could doubtless find use in the margarine and soap industries, and the palm would probably pay to grow in our African dominions, both for oil and fibre. The variety of Macahuba that has recently appeared in London appears to belong to the variety *Wallanana*, as it is nearly globular and rather smaller than the fruit of the type. We are indebted to French & Plucknett, drug brokers, 7 Mincing Lane, London, E.C., for specimens of the fruits.

As in 1812.—A contemporary points out that A. & F. Pears, Ltd., are now advertising a reproduction of one of their announcements published in the "Morning Herald" on September 9, 1812. The advertisement is interesting as showing the wording and type favoured a hundred years ago, and the continuity of Messrs. Pears in the front rank of advertisers.

Madras Nux Vomica

ALTHOUGH nux vomica in its commercial form is widely distributed throughout the tropical regions, the world's supply of the drug is almost entirely derived from India, two-thirds being furnished by the Madras Presidency. The important districts in which the drug is gathered and prepared are the Travancore and Cochin hills, on the Malabar coast, and the Ganjam, Godavery, and Nellore districts on the Coromandel coast. Considering the economic value of nux vomica as the source of strychnine and brucine, the exploitation of the resources of India, says the United States Vice-Consul at Madras, has been greatly neglected. The trees are not cultivated, but are found in a wild state, and in general are of medium size, though occasional specimens reach 100 feet in height. At the end of the cold season in March large tufts of dull-green and white flowers appear. The fruits mature during the rains as bright-looking, brownish-yellow berries as big as a small orange, containing a gelatinous pulp in which are embedded from one to five button-shaped seeds. The wood of the tree is hard, takes a good polish, and is sometimes used for fine cabinet work. It is also reputed to have a certain value as a febrifuge. However, its economic value is not sufficient to have called forth any special protective measures, so that in places the tree has almost disappeared as the result of careless exploitation. So far as possible the right to gather the fruits is sold by a system of licences, put up to auction annually by the forest officers of the different districts. As a matter of fact, however, owing to the difficulty of adequately supervising the work of gathering, nearly half the commercial supply comes on the market through more or less illegal channels. On account of this and the fact of its wild growth no estimates of the amount of the crop are available either before or after the season. Production is rendered still more subject to fluctuation by the price changes in foreign markets, as the domestic market is almost non-existent in an organised sense. Therefore in periods of low prices the people do not find the gathering of the crops worth while, and let much of it rot in the forests. The actual work of gathering the seeds is done by forest tribes—Gonds, Santals, Mahars—to whom this work is a secondary occupation. The pulp is washed or rotted off and the seeds are spread on mats in the sun to dry. They are then sold to small middlemen or licensees, who dispose of them to larger middlemen, and eventually the crops are consolidated in the hands of the large exporters at Madras, Cocanada, or Cochin. This method of collection is obviously more or less unsatisfactory. The exporters wash and sort the seeds, picking out the floaters or underweight ones and the broken pieces. They are then put up in bags of 164 or 182 lb. and sold as "general average of the crop, Europe cleaning." The culls and underweights bring, as a rule, less than half the prices of the cleaned seeds, and in years of low demand may remain unsold. The crop usually begins to arrive on the market in good quantities in December, and the gathering season extends through the cold weather up to March or April. Although the seeds can be kept for long periods, storing does not appear to be a common practice. The most important countries of consignment are the United Kingdom and the United States. A considerable amount of the exports to Great Britain eventually finds its way to America.

"THE LATEST CRAZE."—The latest craze in scent bottles says the "Daily Express," is "lifelike miniatures" of foxes and dogs in glass, fitted with a cork in the mouth.

TRADE WITH TURKEY.—The Board of Trade has issued a general licence permitting the payment or delivery to persons resident or carrying on business in Turkey of any sum of money or property which is or but for the war would have been due or deliverable to such persons in respect of a transaction entered into before the outbreak of war.

Recent Patents

Abstracts of specifications of recently-granted patents for inventions. The complete specification (is. each including postage) of British patents can be obtained from the Patent Office, 25 Southampton Buildings, London, W.C.2, on quoting the name of the patentee and the number of the patent.

Camphor.—Borneol or isoborneol in a finely divided state is caused to pass over "highly active" charcoal, heated to a suitable temperature. (J. Schindelmeiser. 201,332.)

Polishing Powder.—A powder composed of silica and French chalk with relatively small proportions of curd soap, Castile soap and borax. (N. G. Maddison. 201,229.)

Aminoargentomercaptobenzenecarboxylic Acid.—This is manufactured by causing a silver salt to react upon 4-amino-2-mercaptobenzene-1-carboxylic acid. (Meister Lucius & Brünig. 201,302.)

Oxidation by Air.—To prevent oxidation of a substance in the air it is given a phenol content of 1 per cent. to 0.001 per cent. substantially as described. (Professor Charles Mouren and C. Dufraisse. 181,365.)

Aminophenylarsinic Acid.—The acid or a substitution product is made by reducing a nitrophenylarsinic acid or a substitution product thereof in an alkaline solution by means of a reducing sugar. (Les Etablissements Poulenc Frères. 185,728.)

Urea and Formaldehyde Condensation Products.—Urea is heated with a solution of formaldehyde until it effervesces, when a small quantity of nitric acid is added and the whole finally poured into moulds. (Dr. H. Goldschmidt and O. Neuss. 187,605.)

Aromatic Arsenical Compounds.—A process for the preparation of new aromatic compounds containing trivalent arsenic by reducing aldehyde- or keto-arsenic acids of the $RArO_3H_n$ type to the corresponding oxides or compounds— $RAr=O$, and $RAr=AsR$ —by the action of such agents as sodium hydrosulphite, phosphorus trichloride, sodium bisulphite, etc., which do not attack the carbonyl group. (O. Margulies. 199,091.)

Basic Magnesium Carbonate.—A process for preparing basic magnesium carbonate from $MgCO_3 \cdot 3H_2O$ by treatment in a homogenisation apparatus at 40° C. for ten minutes. The neutral magnesium carbonate is obtained by treating a solution of a magnesium salt with ammonium carbonate in molecular proportions in the same apparatus. (Schweizerische Sodafabrik and Chemische Fabrik Griesheim-Elektron. 181,388.)

Detergent Compound.—The following mixture is boiled, and then allowed to solidify:—

Aluminium silicate	75.6 lb.
Silicate of soda	1620 "
Caustic soda lye 36° Bé	1375 "
Soda ash	100 "

(F. H. Guernsey and The Electric Smelting and Aluminium Co. 200,175.)

GERMAN

Organic Metal Compounds.—Aqueous extracts of leguminaceous plants are prepared and the albumin removed by boiling. After filtering, solution of ferric chloride, rendered basic by the addition of sodium carbonate, is added to the liquid. The resulting precipitate is collected, washed and dissolved in a dilute solution of caustic alkali, or of an alkaline carbonate, and the solution is evaporated to dryness. The residue contains 35.84 per cent. of iron, 47.16 per cent. of albumin and 3.62 per cent. of total nitrogen, and is soluble in solution of ammonia. (R. Haberer & Co. D.R.P. 375,614.)

Cholic Acid Ester.—The benzyl ester of cholic acid, which combines the therapeutic properties of both components, can be obtained by allowing one molecule of cholic acid to act on three molecules of thionyl chloride dissolved in benzol. The excess of thionyl chloride is removed by distillation, leaving a yellowish-brown residue, which is heated on the water bath with a solution of

one molecule of benzyl alcohol in benzol until the liberation of hydrochloric acid ceases. After removing the benzol by evaporation a resin-like substance is obtained, softening at 69° C. (Gehe & Co. and H. Runne. D.R.P. 375,370.)

Odourless Naphthenic Acid Ester.—One molecule of naphthenic acid is boiled for some hours with one molecule of benzyl alcohol, to which 5 per cent. of sulphuric acid has been added. The reaction product is washed with water, then with a dilute solution of sodium carbonate, and finally distilled *in vacuo*. Or, sodium naphthenate is heated for several hours at 150° C. with the molecular amount of benzyl chloride, and the excess of the latter removed by steam distillation. The resulting naphthenic benzyl ester is a colourless and odourless oily liquid, and is stated to possess valuable properties as a parasiticide. (Erdöl und Kohle-Verwertungs A.G. and Dr. F. Zernik. D.R.P. 373,849.)

Separation of o- and p-toluolsulphamide.—The so-called residual amides are treated with calcium hydroxide for six hours at a temperature of 80° to 100° C.; the resulting solution is filtered, and hydrochloric acid is added to the filtrate, which now contains a mixture consisting of approximately 70 per cent. of the ortho and 30 per cent. of the para-compound, which is then returned and used in the ordinary process. This fractionation may be repeated. The calcium residue remaining on filtration is treated with water, and then with hydrochloric acid, yielding a certain amount of the pure para-compound. (Saccharin-Fabrik Akt. Ges. vorm. Fahlberg, List & Co. D.R.P. 373,848.)

Hexahydrodiphenyl Oxide.—150 grams of o-o'-diphenol are treated with hydrogen under pressure, at a temperature of 225° to 230° C., in the presence of 10 grams of nickel catalyst. When half the calculated amount of hydrogen has been absorbed the operation is suspended, and the water removed at about 100° C. Hydration is then resumed. On cooling, ether is added, and the catalyst removed by filtration. The ether is distilled off, whereupon, by fractionated distillation, hexahydrodiphenyl oxide is obtained between 125° to 150° C. as a limpid liquid, having an ethereal odour. Boiling-point: 135° C. at 13 mm. This product is intended for use in destroying animal and plant parasites. (J. D. Riedel A.G. D.R.P. 373,850.)

UNITED STATES

Purifying Ammonia Residue.—A process for purifying a hydrolised product of a cyanide-forming reaction characterised in that the compounds present in the mass of reaction, and consisting of silicates and aluminates, which are formed by the base used in the mass after water treatment of the cyanide-holding mass for the production of ammonia, are decomposed by carbon dioxide. (C. T. Thorssell and H. L. R. Lunden. U.S.P. 1,453,210.)

Producing Yeast.—Yeast is propagated in a sacchariferous nutrient solution, beet molasses being particularly suitable, to which has been added compounds containing phosphorus and nitrogen in yeast assimilable form, such as phosphorous acid, phosphoric acid, phosphate of ammonium, sodium phosphate, calcium acid-phosphate, etc. The compounds containing nitrogen preferably employed are ammonium hydroxide and salts of ammonium. (M. Nilsson and N. S. Harrison. U.S.P. 1,449,127.)

Arsenical Compound.—A non-poisonous compound for therapeutic use, di-sodium monethyl arsonate, is described as a white deliquescent crystalline salt, soluble in water. The process consists in boiling a suspension of magnesium monethyl arsonate with an aqueous solution of a compound which contains a radicle capable of combining with the magnesium to form a compound less soluble in water, removing the insoluble magnesium compound and evaporating the residue to dryness *in vacuo*. The substance has a formula of a type C_2H_5As $\begin{smallmatrix} <OR \\ & || \\ & O \end{smallmatrix}$

(L. M. Hüsey. U.S.P. 1,452,605.)

Trade-marks Applied for

The figures in parentheses refer to the classes in which the marks are grouped. A list of classes and particulars as to registration are given in "The Chemist and Druggist Diary," 1923, p. 289.

(From "The Trade-marks Journal," July 11, 1923.)

- "TRIGAL"; for photographic chemicals and films (1). By Farbenfabriken Vorm. F. Bayer & Co., Leverkusen, near Cologne, Germany. 437,356.
- "BAXOL"; for disinfectants (2). By Roxburgh, Morgan & Co., Ltd., 41 Cavendish Street, Glasgow. 437,431.
- "BROMOGENE" on label device, including monogram "J R & Co. E"; for a medicated preparation (3). By J. Robertson & Co., 24 North-West Circus Place, Edinburgh. B 431,164.
- "BISODOL"; for an oxydide of bismuth in camphorated solution (3). "BISCLOROL"; for an oxychloride of bismuth in camphorated solution (3). By F. Lehnhoff-Wyld, 92 Rue Michel-Ange, Paris. 432,634/637.
- "SEBOL"; for medicinal chemicals (3). By A. F. Buisson, 157 Rue de Sèvres, Paris. 432,773.
- "BIOPLASTINA SERONO" on label device ("Serono" and signature disclaimed); for medicinal emulsions for hypodermic injection (3). By Instituto Nazionale Medico Farmacologico, Societa Anonima per Azioni, Via Casilina 73, Rome, Italy. 433,433.
- "CRYSTALLIA"; for medicated tooth powder and paste (3). By P. F. Hope, 7 Union Court, Old Broad Street, London, E.C.2. 434,099.
- "JOVAN" on circle; for medicinal chemicals (3). By J. & J. Canavan, Ltd., 2 High Street, Portadown, Ireland. 434,392.
- Device of girl holding up package; for medicinal chemicals (3). By E. C. De Witt & Co., Ltd., 2 Cherry Orchard Road, Croydon, Surrey. 436,510. (Associated.)
- "BISMO-CERIL"; for a liquid medicine (3). By A. Baird, 43 Avenue de l'Opera, Paris. 436,563. (Associated.)
- "ORNIS"; for medicated bath salts (3). By F. T. Hewitt, 13 Agnes Street, Cowhill, Oldham, Lancs. 436,973.
- "WELLBARD"; for medicines (3). By O. Barwell, Barkford House, Kirdford, near Billingshurst, Sussex. 437,436.
- "AKRO"; for optical instruments, etc. (8). By United Kingdom Optical Co., Ltd., Bittacy Hill, Mill Hill, London, N.W.7. 435,251.
- "PERCOLL" and "FLUENZ"; for all goods (47). By Freda H. Jones, 291 Beverley Road, Hull. 436,975; 437,429.
- "VENDOWER"; for hair preparations (48). By L. J. Lardent, 13 Victoria Place, Eastbourne. 431,937.
- Device of white square on black diamond; for goods (43). By T. McMullan & Co., 42 Victoria Street, Belfast. 431,978. (Associated.)
- "DE SEVIGNE"; for perfumery, etc. (43). By Société Anonyme des Etablissements Rouzaud Chocolat de Royat, "A La Marquise de Sévigné," Route de la Vallée Royat (Puy de Dome), France. 432,616. (Associated.)
- "KALKA," "LINETTE" and "MINAMA"; for perfumery, etc. (43). By Cereola Products, Ltd., 1 St. James's Place, London, S.W.1. 437,694.

(From "The Trade-marks Journal," July 18, 1923.)

- "VISKAP"; for chemicals (1) and for bottle-sealing devices, etc. (13, 37, 39 and 50). By Viscose Development Co., Ltd., Semreh Works, Pembroke Road, Bromley, Kent. 436,982/983/984/985/986. (Associated.)
- "KEROSOL"; for fungicides, etc. (2). By J. McAlley, 193, Broomloan Road, Govan, Glasgow. 435,410.
- "PESTELIM"; for an insect and germ destroyer (2). By A. E. Moore, 3 Brentmead Place, and D. Ventura, 3 Ambrose Avenue, Golders Green, London, N.W.11. 435,968.
- "CHEVALIOD"; for chemicals (2). By John Richardson & Co., Leicester, Ltd., 10 Friar Lane, Leicester. 437,819.
- "MESSAGE CREAM TREATMENT," on label device, including portrait of man and sports representations; for massage cream (3). By United Laboratories and Chemical Co., Ltd., 97 Queen Victoria Street, London, E.C.4. 425,733.
- "NASAMINT"; for medicinal chemicals (3). By Naamlooze Vennootschap A. Wulff & Co.'s Chemische Producten, 30 Ruyschstraat, Amsterdam, Holland. 429,825.
- "TYREE'S POWDER"; for antiseptic powders (3). "TYREE'S BUOHU AND HYOSYAMUS"; for a liquid medicine (3). By J. S. Tyree, 15th and H Streets, N.W., Washington, U.S.A. B 432,234/235.
- "LIBEROL"; for medicines (3). By Beatrice M. Thompson, 62 Woodcote Road, Wanstead, Essex. 434,978.

- "JOYWALK"; for pharmaceutical preparations for the feet (3). By Wynter Bros. & Co., Ltd., 18/20 Low Green Terrace, Great Horton, Bradford. 435,972. (Associated.)
- "LYKWA"; for medicinal chemicals (3). By Roe & Lincoln, 101 Station Hill, Kidderminster. 436,272.
- "TERRADIUM"; for all goods (3). By Terramax, Ltd., 6 Livery Street, Birmingham. 437,051.
- "GERMONT" and "GERMACURA"; for medicinal chemicals (3) and for perfumery, etc. (43). By Taylor's Drug Co., Ltd., 347/359 Burley Hill, Leeds. 437,199/200/201/202. (Associated.)
- "NINNEY SALVE"; for a medicinal preparation for corns and bunions (3). By F. W. Towan, 25 Johnston Terrace, Keyham, Devonport. 437,352.
- "NOXZEMA"; for medicinal chemicals (3). By the Emsee Co., 42 Stanley Street, Liverpool. 437,402.
- "ETHIDOL"; for medicinal chemicals (3). By Burroughs Wellcome & Co., Snow Hill Buildings, London, E.C.1. 437,469.
- "COMMODORE"; for medicines (3). By J. E. Ellis, "Batavia," Brownberrie Lane, Horsforth, nr. Leeds. 437,761.
- "GLANOID"; for medicinal chemicals (3). By Armour & Co., Ltd., Queen's House, Kingsway, London, W.C.2. 438,172.
- "HARRINGTONS SQUARES"; for sanitary towels (11). By Harringtons (London), Ltd., 13 Cheapside, London, E.C.2. B 425,059.
- "ROLETTA"; for surgical instruments, etc. (11). By S. Matthews & Co., Ltd., 19-21 Farringdon Street, London, E.C.4. 435,160.
- "AMBIENT"; for surgical instruments, etc. (11). By J. B. Mee, 35 Colmore Row, Birmingham. 436,592.
- "PLUS FOURS"; for goods (47) and for perfumery, etc. (43). By E. Cook & Co., Ltd., Bow, London, E.3. 435,130/129. (Associated.)
- "IF WINTER COMES"; for perfumery, etc. (43). By Breidenbach & Co., 43 Greek Street, Soho Square, London, W.1. 436,227.
- "GOLDEN GATE"; for perfumed soap (43). By Tyson & Co., Ltd., 6 Blackstock Street, Liverpool. 436,296. (Associated.)
- "CONQUEST"; for perfumery, etc. (43). By W. Gossage & Sons, Ltd., Widnes, Lancs. 437,125. (Associated.)
- "WISMAL MAGI"; for all goods (43). By Buglawton Chemical Co., Ltd., Havannah Street, Buglawton, nr. Congleton, Cheshire. 437,723. (Associated.)

(From "The Trade-marks Journal," July 25, 1923.)

- "EONIT PRODUCTS" on diamond-shaped device; for chemicals (1). By Eonit, Ltd., 2 Gresham Buildings, Basinghall Street, London, E.C.2. 436,876.
- "RESINGHAM"; for chemicals (1). By Robt. Clark & Co., Ltd., 24 Grosvenor Gardens, London, S.W.1. 438,015.
- "THE PIPER O' PERTH" under picture of piper followed by rats; for rat poison (2). By T. Harley, 29 High Street, Perth. 435,730.
- "VIDENOR"; for disinfectants and weed-killers (2). By W. S. Birch & Co., 44 Aldbro' Street, Kingston-upon-Hull. 435,901.
- "KILROACH"; for insect-destroying preparations (2). By C. V. Hassall, 11 Long Causeway, Farnworth, Lancs. B437,054.
- "CRESART"; for disinfectants (2). By Weir & Co., 3 Rathcoole Avenue, Hornsey, London, N.3. 437,577.
- "NITROLIM"; for chemicals (2). By North Western Cyanamide Co., Ltd., Winchester House, Old Broad Street, London, E.C.2. 437,595.
- "NARKYLEN" for medicinal chemicals (2). By C. H. Boehringer Sohn, Boehringerstrasse, Nieder-Ingelheim-on-the-Rhine, Germany. 427,572.
- "INFANTISOP"; for an infants' soothing mixture (3). By The Fikeny Stores Co., 199 Oakbrook Road, Sheffield. 435,681.
- "LAM-BUTI"; for medicated articles (3) and for surgical instruments, etc. (11). By Lambert, Son & Watkins, 60 Queen's Road, Dalston, London, E.8. 435,163/164. (Associated.)
- "LACTEOSOTE"; for a pharmaceutical preparation (3). By P. Famcl, 16 Rue des Orteaux, Paris. 436,720.
- "BIDOR" with outline sketch of head; for all goods (3). By Internationale Laboratorien & Klinisch-Therapeutisches Institut Arlesheim Aktien-Gesellschaft, Arlesheim, Switzerland. 437,353. (Associated.)
- "RAN-E-TISS"; for a medicated lotion (3). By W. J. Whybrow, 60 Chatham Road, Wandsworth Common, London, S.W.11. 435,799.
- "SPURGO"; for corn-removing preparations (3). By G. T. W. Newsholm, Ltd., 27 High Street, Sheffield. 436,401.

Austrian Drug Trade

PRIOR to the war the Austro-Hungarian monarchy figured as one of the chief sources of supply of medicinal plants, exporting annually thousands of tons of drugs, principally to France, Great Britain and the United States. After the collapse of the Danubian empire the Austrian wholesale drug trade lost its importance in the world market, because now the various constituent portions of the old empire from which these supplies were derived had become independent states, and had entered into direct business relations with foreign countries. Vienna was no longer the central market for drugs for the secession states, and the catastrophic depreciation of the Austrian currency did more than all the newly erected tariff walls to handicap the wholesale drug trade. Hungary used to be the chief purveyor of the drugs exported from Austria, supplying principally chamomiles, capsicum, buckthorn, lime flowers, elder flowers, etc. Liquorice formed the chief contribution from Bohemia, which also sent fenugreek, mallow, oak bark, as well as numerous herbs and leaves used in medicine. Croatia and Slavonia supplied lime flowers and chamomiles, while insect powder is a known staple product of Dalmatia. In Galicia various roots were collected, principally calamus, in addition to lime flowers, etc., while South Tyrol provided a number of mountain plants used in therapeutics, foremost among which figure bearberry leaves. All these drugs, which were formerly exported by Austria, have now to be imported from countries which have become independent. It is true that a large variety of medicinal plants grow within the present confines of Austria; however, in order to utilise them it will first be necessary to instruct and interest the people in collecting these plants. Formerly little interest was taken in the collection of medicinal plants, since industry, agriculture and trade offered abundant opportunities for gaining a livelihood, and it was only among the frugal agrarian populations of Hungary, Yugo-Slavia and Poland that this occupation was actively taken up. However, the increasing unemployment, the high cost of living and the difficulty of making both ends meet as a result of the depreciation of the currency, induced a large section of the population of the Austria of to-day to turn its attention not only to the collection, but also to the cultivation of medicinal plants. The leading Austrian wholesale drug houses, the firms of Philipp Röder—Bruno Raabe A.G., G. & R. Fritz—Pezoldt & Süss A.G., and Chemosan A.G., took active steps to popularise the cultivation and collection of drugs, in which they were assisted by the government, the department for the protection of plants, and the committee for the advancement of the cultivation of medicinal plants. The first attempts to cultivate medicinal plants were undertaken in Lower Austria, lactucarium and saffron being the plants selected, but after a brief period the attempt had to be abandoned, owing to the absence of any satisfactory return. Three or four years ago, under the style of "Medica," a company was formed which now owns large plantations in the neighbourhood of Vienna and in the Burgenland, where mallow, wormwood, marshmallow, calendula, etc., are grown. About the same time the above-mentioned three Viennese wholesale drug houses founded jointly a firm, "The Austrian Medicinal Plant Cultivation Co., Ltd.," with the object of undertaking on a large scale the cultivation of plants yielding drugs. It owns some ninety acres in the vicinity of Klagenfurt, in Carinthia, and the plants cultivated include peppermint, marshmallow, stramonium, chamomiles, wormwood, blessed thistle, hyssop, etc. In addition, the cultivation of a number of medicinal plants is being taken up on a small scale by private individuals and farmers; in many cases part of a garden is devoted to this purpose. The wholesale drug houses are now endeavouring to persuade these small growers to combine, and instead of keeping the drugs they grow at home, to be used as popular remedies when occasion arises, to sell the crops to the drug trade. By doing so it is hoped that the business possibilities of cultivating drugs will become apparent to a large

section of the population, with the result that many will be induced to take it up as a lucrative side-line to gardening or farming. Nevertheless, up to the present wild growing plants yield the bulk of the supplies offered to the drug trade, gathered either by individual collectors or by collecting organisations. Frequent attempts have been made to collect drugs by schoolchildren, but the results have been highly unsatisfactory. As a rule, the children did not evince sufficient interest; however, it may be possible in time to create efficient collecting troops in the schools. It is proposed that a portion of the profits derived from the sale of the collected plants should be distributed among the children, while the remainder would be utilised to form a school fund to assist the poorer scholars in purchasing books, etc. Austria possesses a wealth of medicinal plants, but it is only since the armistice that these are being collected in appreciable quantities; prior to the war the Viennese wholesale drug trade received ample supplies at very low prices from the agricultural portions of the monarchy, but the destruction of the Habsburg empire wrought a fundamental change. Of the eight federal states which constitute the present Austria, Upper Austria is the richest in medicinal plants, yielding large supplies of arnica, bilberries, mullein, also ergot. Tyrol sends agaric, aconite, savin, masterwort and carrageen. From Carinthia lycopodium, turpentine, raspberries, ergot, caraway, carrageen, corn-ergot, corn-silk, melilot and buckbean are obtained, while Salzburg yields lycopodium, and South Styria ergot and several herbs, in addition to large quantities of a very white variety of talc. Finally, mention may be made of the occurrence of asbestos in the Gastein valley, in Salzburg; it is exported chiefly to Switzerland, where it is used as an insulator in the electrical industry.

Margosa (Indian "Neem")

THE Margosa, *Azadirachta Indica*, a large ornamental tree belonging to the natural order Meliaceæ, is indigenous to India, being cultivated nearly all over the peninsula, as well as in Burma. It has been suggested for use in malaria, but its efficacy is doubtful. The bark contains bitter principles of a resinous nature, and the alcoholic tincture or fluid extract is the most efficient preparation of the bark. About 10 per cent. of a yellow fixed oil is contained in the seeds, and can be extracted by pressure. It has a specific gravity of 0.925 at 15° C., a bitter, disagreeable taste, and alliaceous odour. According to an exhaustive research by Dr. Warden, "Neem oil" (i.e., margosa oil) consists of the fixed fatty acids, stearic, oleic, and a small amount of lauric, with butyric and a trace of valeric acids, as the volatile fatty principles. Sulphur was estimated to the extent of 0.427 per cent. It has been found that, when the inner bark is moistened with water, a ferment yields a sulphur compound of allyl, allied to that obtained from garlic. The seeds may contain a similar ferment. An undetermined alkaloid and resins were also isolated by Dr. Warden. The wood is not attacked by insects, and the leaves are used to prevent the ravages of white ants and other insects. The bark may be used as a tonic, astringent, and febrifuge; the fruit is purgative, and is regarded as having anthelmintic properties. Various suggestions have been made regarding the use of other parts of the plant in medicine. The oil, for example, is useful as an application in various skin diseases, and has been recommended in combination with chaulmogra and gurgun oils as an application in leprosy.

FEES FOR PATENTS.—The Institute of Patentees, states "The Times" of August 23, has prepared a return showing the cost of keeping patents in force. An example is given of the relative cost in respect of five patents, which in a pre-war period cost the inventor £41 in fees in eight years, whereas the corresponding amount for the years 1915-23 was £163.

Trade Report

42 Cannon Street, E.C.4, September 6.

MAINLY as the result of the unprecedented calamity in Japan, the section of the Mincing Lane markets dealing in produce imported from that country has shown feverish activity and excitement, particularly in menthol, the spot price of which on Tuesday and Wednesday advanced from hour to hour. Dementholised mint oil and refined slab camphor have also advanced, as it is impossible to say (beyond goods on the water) when further shipments will be received, and it is quite possible that *force majeure* will be claimed on c.i.f. contracts. Other Japanese products, like agar agar and vegetable wax, have tended higher, but insect flowers are unchanged. Apart from this the markets have been depressed by the news of the Japanese disaster, which for the moment has put the Græco-Italian affair in the shade. Among the rates of exchange an unwelcome feature has been the weakening of the sterling-dollar rate, which has declined to the lowest point of the year. The German mark has created a fresh record at one hundred millions to the pound, but this excites no interest. At the same time further advances are notified in crude drugs, such as hydrastis, mandrake, cascara sagrada, and balsam tolu at the sources. Areca is dearer and ergot easier. Chamomiles are extremely dear and the outlook obscure. There is little change to record among pharmaceutical chemicals, the demand continuing very restricted. Morphine and codeine and their salts are dearer as the result of the advance in opium. English refined camphor is unchanged, but in good demand. Among industrial chemicals business also continues slow, with the few movements in prices favouring buyers. Borax products are lower from the makers; sodium hyposulphite is also cheaper and zinc oxides are dearer.

Higher	Firmer	Easier	Lower
Acid oils Areca Camphor (crude) Camphor (Jp., rel.) Canary seed Caraway seed Coconut (desicc.) Codeine and salts Isinglass Menthol Mint oil (Jp.) Morphine and salts Peppermint oil (Amer.) Soya oil Zinc oxide	Agar-agar Carbolic acid (crystals) Clove oil Palm kernel oil Palm oil Shellac Wax, veget. (Jp.) Steadier Lead acetate	Hydroquinone Mercury Naphthalene Rubber Senega Sodium acetate Turpentine	Bleaching powder Borax Borax glass Boric acid Cod-liver oil Copaiba Copper sulphate Ergot Sodium hyposulph. Spike oil (Sp.)

Exchange Rates on London

The following is a list of Continental and other exchange rates against the pound sterling on London prevailing at 4 p.m. on Wednesday :—

Place	Method of Quoting	Par of Exchange	August 29	September 5
Amsterdam	Fl. to £	12.107	11.56—11.56½	11.50½—11.51½
Berlin	M to £	20.43	32.34 millions	100 millions
Brussels	Fr. to £	25.22½	97.50—97.70	98.60—98.65
Calcutta	Per rup.	24d.	16½d.—16¾d.	16½d.—16¾d.
Christiana	Kr. to £	18.159	27.90—27.95	27.90—27.93
Constantinople	Pst. to £	110	780—800	780—800
Greece	Dr. to £	25.22½	240—250	245—255
Italy	Lire to £	25.22½	105½—105½	106½—106½
Lisbon	Escu.	53½d.	2½d.—2½d.	2½d.—2½d.
Madrid	Pts. to £	25.22½	33.75—33.78	33.71—33.73
Montreal	\$ to £	4.86½	4.66—4.66½	4.62½—4.62½
New York	\$ to £	4.86½	4.54½—4.54½	4.51½—4.51½
Paris	Fr. to £	25.22½	80.10—80.15	80.80—80.85
Singapore	Per dol.	—	28½d.—28½d.	28½d.—28½d.
Switzerland	Fr. to £	25.2½	25.20—25.22	25.08—25.10
Vienna	Kr. to £	24.02	320,000—325,003	320,000—325,000
Yokohama	Per yen	24.58d.	25½d.—25½d.	nominal

Cablegram

NEW YORK, September 5.—Business is dull. Peppermint oil in tins has advanced a further 20c. to \$2.90 per lb. Mandrake (podophyllum) root is dearer at 19c. and hydrastis has advanced to \$3.65. Cascara sagrada is 1c. higher at 18c., and balsam tolu is 15c. dearer at \$1.90. Copaiba is cheaper at 27c., likewise Oregon balsam of fir at \$2.70. Mercury has been reduced to \$60.00 per flask and antipyrine to \$2.50 per lb.

Crude Drugs, etc.

AGAR AGAR does not appear to have been substantially affected by the calamity in Japan so far as regards spot prices, which are from 5s. 6d. to 5s. 9d. for No. 1 Kobe.

ALBUMEN.—Prime Chinese egg remains very firm with sales at 3s. 7d. per lb. on the spot, and for August-September shipment at 3s. 6½d. c.i.f. is quoted. Higher prices are expected before the end of the year.

ANTIMONY.—Business has been generally dull, but quotations are maintained in spite of a few resale lots offering from the Continent. Special English brands stand at £34 10s. to £35, and warehouse lots of foreign regulus are £25 10s. A fairly large parcel of Chinese refined has come in, and c.i.f. terms for shipment are about £23 10s.

ARECA.—To arrive, Ceylon quotes the higher rate of 37s. 6d. c.i.f., and on the spot 45s. is asked.

BALSAM TOLU.—For October delivery \$1.85 per lb. is quoted, the U.S. market continuing its advance.

CAMPHOR (CRUDE) is dearer, with spot sales of Chinese crude at up to 3s. 3d. per lb., with sellers quoting 3s. 6d. on Wednesday.

CAMPHOR (REFINED).—As a result of the Japanese calamity, the spot market for slabs shows an aggregate advance of 9d. to 1s. per lb. The market prior to the disaster had been extremely dull with an easy undertone, but immediately the news came to hand several lines were sold at 3s. 5d. per lb., and by Wednesday 3s. 9d. to 4s. 3d. had been paid, and 4s. 6d. was asked at the close. Sales of ¼-oz. tablets have been made at 4s. 1d. to 4s. 3d., with 4s. 6d. asked.

CASCARA SAGRADA.—Very limited supplies of new bark are offered from the Pacific Coast, with 80s. to 82s. 6d. per cwt. c.i.f. quoted.

CASCARILLA.—Quill is scarce on the spot, offering at 2s. 6d. per lb., and sittings at from 1s. 6d. to 1s. 8d.

CHAMOMILES.—On page 369 we publish a circular letter from Paris in regard to the French crop and prices. Meanwhile the position of the markets remains unsettled, as a certain section of the dealers abroad hold aloof in the hope of bringing present exorbitant prices down. The Belgian crop is regarded as fairly good, but late, with much depending as to colour on the weather now prevailing. France and the United States already appear to have bought largely of the Belgian crop, and as usual those who buy early get the first pickings, later deliveries tapering off in regard to quality. Spot prices vary somewhat, dealers quoting from 375s. up to 425s., according to quality, for lots just landed.

CINCHONA.—At the auction held at Amsterdam on August 29, 291 bales and 151 cases Java pharmaceutical (Succirubra) bark, weighing 18,949 kilos., and containing the equivalent of 397 kilos. quinine, sold at from 33 to 107 cents per half-kilo. On the whole the quality of the parcels offered was better than former auctions, but this had no particular effect on the desire to buy. There were also sold 14 bales or 810 kilos. African bark at 49 cents per half-kilo.; prices generally were firm. The next auction will be on October 3.

The Department of Agriculture, Commerce and Trade in Buitenzorg estimates the total production of cinchona in the Dutch East Indies for 1923 at 7,220,233 kilos. From January 1 to the end of April 2,336,254 kilos. of bark were actually collected. These figures cover 87 different plantations.

CLOVES.—Zanzibar are steady, with spot sellers at 1s. 1d. per lb. To arrive, October-December shipment has been sold at 1s. 1d. to 1s. 1½d. per lb. c.i.f., closing

buyers at 1s. 1d. c.i.f. The weekly wharf statistics show 1,626 bales landed and 121 delivered, leaving a stock of 16,364 bales, against 1,960 bales in 1922.

COCOA BUTTER is steady, C.F.R. offering at 1s. 4d. per lb., and other makes at 1s. 3½d. per lb. in not less than one-ton lots.

COCONUT (DESICCATED) is dearer, with halves selling at up to 40s. to 39s. 6d. per cwt. on the spot. For September-October and October-November shipment sales have been made at 39s. per cwt. c.i.f.

COD-LIVER OIL.—Our Bergen correspondent writes on August 27 that the market continues quiet with business practically at a standstill, and the quotation for finest non-freezing steam-refined quality is easier at 100s. to 102s. per barrel, c.i.f. London.

ERGOT continues easy for prompt shipment, offering at 1s. 3d. per lb. c.i.f., and even at a trifle less for Portuguese or Spanish.

HYDRASTIS remains very firm, and to come forward 17s. per lb. c.i.f. is quoted.

INSECT FLOWERS.—Japanese do not appear to have been affected by the disaster, as no indication has been given of any change in price.

MAGNESIUM.—The market is irregular, being affected by the cheap parcels offering of Continental material at 3s. per lb. and even less. Home makers are quoting 3s. 3d. to 3s. 9d. per lb., according to quantity.

MENTHOL.—Owing to the Japanese calamity, there has been a rush to cover requirements, and never in the history of menthol has there been so much excitement, particularly on Tuesday and Wednesday, when prices advanced almost hourly. On Saturday last spot sales of Kobayashi-Suzuki were made at 39s., on Monday morning at 40s., midday at 43s. 6d., Monday evening at 45s., and on Tuesday at from 46s. 6d. to 47s. 6d., the market closing with the intimation that there were buyers at 47s. 6d. and no sellers. On Wednesday the excitement reached its height, and with consumers anxious to cover, prices advanced hourly with sales from 50s. up to 60s. per lb., the latter being the price when our report closed on Wednesday evening. The following statistics in regard to menthol and oil of mint production, consumption and export were recently issued:—

	1918	1919	1920	1921	1922
Amount Produced .. lb.	240,000	520,000	570,000	560,000	520,000
Refined Crystals (40%) lb.	96,000	208,000	228,000	224,000	208,000
Refined Oil (60%) .. lb.	144,000	312,000	342,000	336,000	312,000
Crystals Home-used .. lb.	9,600	20,800	22,800	22,400	20,800
Oil Home-used .. lb.	14,400	31,200	34,200	33,600	31,200
Total Export Crystals lb.	86,400	187,200	205,200	201,600	187,200
Export Crystals (cases)	1,440	3,120	3,420	3,360	3,120
Total Export Oil .. lb.	129,600	280,800	307,800	302,400	280,800
Export Oil .. (cases)	2,160	4,680	5,130	5,040	4,680

MERCURY.—In the latter part of last week there was some indication of further weakening in values, while small parcels in second-hands were offered down to £8 12s. 6d. per bottle. The tendency early this week improved slightly with some few buyers coming forward at about £8 15s., but there were but few offers reported at anything under £9 per bottle for spot delivery. One or two inquiries were received from the United States, but the general demand has certainly remained most disappointing, and, as we said before, there are ample stocks available, so that the market may easily weaken again under the much larger output in both Italy and Spain.

OLIVE OIL has been in greater demand and prices have a firmer tendency, spot holders quoting from 6d. to 1s. 6d. per gallon more. B.P. can be had at 5s. 8d. per gallon in barrels.

PODOPHYLLUM ROOT is still advancing in the United States; on the spot 115s. per cwt. is quoted.

QUILLAIA remains firm with fair average quality quoted in Liverpool at from £33 to £35 per ton.

RUBBER has shown a slightly easier tendency, and spot prices are about ½d. per lb. lower. The spot demand has not been so brisk, and orders from America during the past few days have not been plentiful. However, it remains difficult to buy any fair quantity at the present parity, and the first-hand importers are still holding for 1s. 4d. per lb., which is the figure for special marks. For the first time for many months the arrivals have exceeded the deliveries, and last week arrivals totalled 1,908 tons; deliveries amounted to 750 tons, thus showing an increase of 1,158 tons in the London stocks. This was not unexpected, and is due to the hold up of arrivals on account of the recent dock strike. Quotations (Wednesday, 5 p.m., No. 1 standard crêpe and ribbed smoked sheet spot and September, 1s. 3½d.; October-December, 1s. 4½d.; January-March, 1s. 4½d.; hard fine para, 1s. 3d. spot. Balata firm, W.I. sheet, 3s. 6½d.; Venezuela block, 3s. 2d.

SAFFRON.—Valencia is quoted on the spot at 132s. 6d. to 142s. 6d. per lb.

SEEDS.—The following spot quotations were current on Wednesday: Spanish ANISE, 85s., and Russian 62s. per cwt. CANARY SEED.—Mazagan, 18s. per cwt.; Larache, 17s. per cwt. CARAWAY SEED.—Dutch, 92s. 6d. per cwt. CORIANDER SEED.—Sound 45s., and wormy 34s. to 37s. 6d. per cwt. CUMIN SEED.—Morocco, 125s. per cwt. DILL SEED, 19s. 6d. to 21s. 6d. per cwt. FENNEL SEED.—Indian, 43s. to 45s. HEMP SEED, Manchurian 14s. 6d. per cwt. FENUGREEK SEED.—Morocco, 25s., and Palestine 22s. 6d. per cwt. LINSEED.—Morocco, 22s. 6d. per cwt. MUSTARD.—English, 30s. to 35s. per cwt. Market continues quiet.

SENEGA.—Spot sellers quote 3s. 1d. per lb. net, and to arrive 2s. 11d. c.i.f. is asked for new crop. United States advices continue strong, and it is anticipated that higher prices will prevail before October 1, as offerings of new crop are light. The "Aquitania," from New York, has brought 19 bales, which have been sold to arrive.

SERPENTARY is in small supply, but the demand is also small, and has not yet affected the price, which is from 4s. 6d. to 4s. 9d. per lb.

SHELLAC is dearer, sellers of usual standard TN orange quality quoting 275s. to 280s. per cwt., and these prices have been paid; fine orange is 300s. to 365s.; and AC cakey, 270s. to 275s. The sales for arrival include October at 270s. to 280s., and December at 262s. 6d. to 275s. The quantities of shellac landed last month were very heavy, and in spite of excellent deliveries, amounting to about 6,300 cases, there was an increase of some 4,500 cases in the stocks.

WAX (VEGETABLE).—Spot sales have been made at 75s. per cwt., but some holders now ask 77s. 6d. to 80s. Stock on spot is about 800 cases. Shipment market is nominal.

Essential Oils

ALTHOUGH interest is mainly centred in Japanese mint oil business has been fairly active. The adulteration of Ceylon citronella oil is holding up trade in this article. American peppermint is again dearer. Clove oil is in good demand at higher rates. Spanish spike oil is cheaper owing to competition for business. Paraguayan petitgrain is very firm and eucalyptus is scarce with a dearer tendency.

ANISE (STAR).—"Red Ship" on the spot is quiet and unchanged at 1s. 9d. per lb. and for shipment 1s. 8½d. c.i.f.

BERGAMOT is unchanged for 37 to 39 l.a. at 12s. to 12s. 6d. per lb. on the spot.

BOIS DE ROSE (FEMELLE) is tending firmer on the spot. Sales have been made at 10s. per lb. and up to 10s. 6d. is quoted. There has been an improved demand lately.

CAMPOR.—White essential has been sold on the spot at 80s. per cwt.

CARAWAY.—Double distilled Dutch is offered at from 22s. to 22s. 6d. per lb., delivery this month. One importer quotes 26s. There has been very little forward buying lately, but prices are expected to remain high.

CASSIA on the spot is steady at 11s. 6d. per lb. on the spot and for shipment at 10s. 6d. c.i.f.

CEDARWOOD.—American in drums is obtainable at 1s. 2d. per lb.

CITRONELLA.—Owing to the adulteration of recent shipments by means of alcohol, which has been found by the Customs to be present to the extent of 10 per cent., trade in Ceylon oil has been seriously affected. Shippers who have been involved in considerable loss are at present disinclined to undertake further business. As the trouble evidently lies with native distillers it is difficult to obtain redress. The nominal spot price is 3s. 11d. per lb. Shipment afloat, it is anticipated, will be found similarly treated. Java oil is steady at 4s. 1d. per lb., September-October shipment offering at 3s. 9½d. c.i.f.

CLOVE.—English distilled is quoted at the higher rate of 7s. 6d. per lb.

CORIANDER on the spot is quoted at 65s. per lb.

DILL.—East Indian is quoted at 16s. per lb.

EUCALYPTUS is firm on the spot at from 2s. 2d. to 2s. 3d. per lb. for 70 to 75 per cent. cineol. The "Persic" from Melbourne has brought 400 cases to London.

GERANIUM.—Bourbon is steady on the spot at 29s. 6d. per lb. and Algerian at 27s. 6d. to 29s.

GUALACWOOD is in small demand at 19s. per lb.

JUNIPER BERRY.—Fine quality B.P. oil is offered on the spot at about 4s. 6d. to 4s. 9d. per lb. Demand has been good recently. Wood oil is obtainable at 2s. 3d.

LAVENDER.—French on the spot is obtainable at 18s. 6d. per lb. for 38 to 40 per cent. ester. Some holders are not offering at present.

LEMON on the spot is unchanged at 2s. 8d. to 2s. 10d. per lb. Prompt shipment is 2s. 8d. c.i.f.

LEMONGRASS.—Cochin is unchanged at 2½d. to 2½d. per oz. spot; for shipment 2½d. c.i.f. is quoted.

ORANGE.—Sicilian is unchanged at from 11s. 6d. to 12s. per lb. on the spot. West Indian sweet is obtainable at 9s. 6d.

PATCHOULI.—Penang is cheaper on the spot, with sellers at 25s. per lb. and upwards. Prices for forward shipment range from 22s. per lb. c.i.f. upwards. Mysore quality is quoted at 30s.

PEPPERMINT.—American natural tin oil is dearer at 14s. per lb. on the spot and c.i.f. to arrive.

PETITGRAIN.—Paraguayan is firm on the spot at 7s. 6d. per lb.

SPIKE.—Spanish on the spot is cheaper, with sales in the neighbourhood of 2s. 6d. per lb. for large drums.

THYME.—Spanish is steady at 4s. per lb. for 28 to 30 per cent. phenols.

VETIVERT.—Bourbon on the spot is obtainable at 22s. 6d. per lb. Java distillate is offered at 29s.

Aromatic and Synthetic Chemicals, etc.

Amyl salicylate ..	3/3 to 3/6	Iso-engenol ..	15/6
Aubepine ..	12/6 to 15/-	Linalol ..	15/- to 18/6
Enzyl acetate ..	2/9 to 3/-	Linalyl acetate ..	19/6 to 21/-
" alcohol ..	2/9 to 3/-	Methyl anthranilate ..	8/-
" benzoate ..	2/9 to 3/-	" salicylate ..	2/3 to 2/6
Brometro ..	9/- to 10/-	Musk xylol ..	10/6 to 11/-
Cinnamic alcohol ..	26/- to 28/-	Musk ambrette ..	36/-
Citral ..	9/- to 9/6	Phenylacetic aldehyde ..	17/- to 17/6
Coumarin ..	18/-	Phenyl ethyl alcohol ..	15/-
Eugenol ..	11/6 to 12/-	Safrol ..	2/- to 2/3
Geraniol (palmarosa) ..	28/- to 29/-	Terpineol ..	2/9 to 3/-
(citronella) ..	12/-	Vanillin ..	23/- to 23/6
Heliotropine ..	7/- to 8/-		

Pharmaceutical Chemicals, etc.

THERE is no change of importance to record in this section during the past week. Business continues to be very restricted in volume. The outlook does not point to any very considerable change in the near future.

ACETANILIDE holds up to its former rates of 1s. 5d. to 1s. 7d. per lb., with occasional inquiry on the market.

ASPIRIN.—The best brands are not offering on spot below 3s. to 3s. 1d. per lb. Business has been better.

BARBITONE keeps on the slow side, with the quoted price unaltered at about 18s. per lb.

BENZOIC ACID is seldom inquired for and is quoted at 2s. 3d. to 2s. 6d. per lb.

BETANAPHTHOL is quoted in the region of 1s. 10d. to 1s. 11d. per lb., with the market steady but quiet.

BENZALDEHYDE .03 is unchanged at 3s. per lb.

BENZONAPHTHOL is inactive, with the quoted value 5s. per lb.

BORIC ACID.—English refiners reduced their prices on September 1 by £2 per ton, and now quote commercial quality of crystals, granulated or small flaked at £48 per ton; powdered, £50; extra fine ditto, £52; B.P. quality crystals, £54; powdered, £58; extra fine ditto, £60 per ton.

BROMIDES.—The past week has brought no improvement; prices are still in buyers' favour and rather irregular. Ammonium, about 7d. per lb.; potassium, crystals and granular, 6½d. to 6¾d. per lb.; and sodium, about 7d. to 7½d. per lb.

CALCIUM LACTATE is a good market with moderate inquiry about, and is quoted steadily at about 1s. 9d. per lb.

CHLORAL HYDRATE seems likely to firm up, and offers below 4s. per lb. for duty paid are now difficult to find.

CITRIC ACID (B.P. crystals).—The market quotation is still in the region of 1s. 6d. per lb., less 5 per cent., but the few sales effected would be at well under this figure for quantities. The outlook is still unpromising.

CODEINE.—Owing to the further rise in opium, makers on September 7 announced an advance of 6d. per oz., their new scale of prices being as follows:—

	List price.	16 oz. and upwards.	25 oz. and upwards.	100 oz. and upwards.
Codeine:				
Alkaloid Cryst. .. oz.	15/9	15/6	15/3	14/9
Precip. ..	15/9	15/6	15/3	14/9
Hydrochloride ..	13/8	13/5	12/11	12/8
Phosphate ..	11/11	11/8	11/5	11/2
Sulphate ..	13/8	13/5	12/11	12/8

CREOSOTE B.P. keeps up to its former levels of 2s. 5d. to 2s. 6d. per lb. on a quiet market.

CREOSOTE CARBONATE has been idle and is unchanged at about 8s. 3d. per lb.

GUALACOL CARBONATE has had a slow week of business; dealers are offering at about 8s. to 8s. 3d. per lb.

HEXAMINE on spot is worth about 3s. 9d. per lb. for small lots; slightly cheaper rates might be offered to buyers of quantities.

HYDROQUINONE seems a little weaker, with spot offers from 3s. 3d. and upwards per lb., with business dragging.

METHYL SALICYLATE is quoted at 2s. 3d. to 2s. 6d. per lb.

METHYL SULPHONAL shows little sign of life: nominal value as quoted is about 14s. 6d. per lb.

MORPHINE AND SALTS.—Owing to the increased cost of opium makers announce a further advance of from 6d. to 9d. per oz. from September 3. Their prices for the alkaloid and salts are as follows:—

	List price.	16 oz. and upwards.	25 oz. and upwards.	100 oz. and upwards.
Morphine:				
Alkaloid Cryst. ..	13/3	12/11	12/7	12/4
Precip. ..	13/-	12/8	12/4	12/-
Acetate ..	10/3	10/-	9/9	9/6
Bronide ..	13/-	12/8	12/4	12/-
Hydrochloride ..	10/3	10/-	9/9	9/6
Cryst. ..	10/6	10/3	10/-	9/9
Meconate ..	13/-	12/8	12/4	12/-
Sulphate ..	10/3	10/-	9/9	9/6
Cryst. ..	10/6	10/3	10/-	9/9
Tartrate (neutral) ..	13/-	12/8	12/4	12/-
Morphine diacetyl ..	15/9	15/6	15/3	14/9
Morphine diacetyl hydrochloride ..	14/9	14/6	14/3	13/9
Morphine ethyl hydrochloride ..	15/9	15/6	15/3	14/9

PARAFORMALDEHYDE is unchanged on spot, with dealers offering at about 3s. 6d. per lb.

PARALDEHYDE continues irregular on quotations, varying from a shade under 1s. 5d. up to 1s. 7d. per lb.

PHENACETIN has been in a little better request this week, and 6s. per lb. is quoted.

PHENAZONE has been finding some business, but only at prices cut below the quoted rates of 7s. 3d. to 7s. 6d. per lb.

PHENOLPHTHALEIN keeps up to last week's rate of about 6s. 6d. per lb., with some inquiry.

POTASSIUM PERMANGANATE is a good market with business satisfactory. Dealers offer B.P. quality at about 10d. per lb.

RESORCIN is dull and rather weak as quoted at 5s. 6d. to 6s. per lb.

SALICYLIC ACID, B.P. keeps up to last week's rates of 2s. 2d. to 2s. 4d. per lb., with business limited.

SALOL.—Offers on spot seem to vary, 3s. 1d. to 3s. 3d. being asked in some quarters, while other offers are reported below 3s. per lb.

SODIUM BENZOATE is nominal at 2s. 6d. per lb. on an idle market.

SODIUM DIETHYLBARBITURATE is well maintained as quoted at 18s. per lb.

SODIUM SALICYLATE.—The position on spot is rather peculiar. At one time crystals were to be had at a lower rate than powder, when the reverse is generally the case. Inquiry points to powder and crystals being worth about the same in the region of 2s. 5d. per lb. on spot.

SULPHONAL remains quite neglected, with dealers quoting at about 14s. per lb.

TARTARIC ACID.—For B.P. 1s. 2d. per lb. is the quoted rate, less 5 per cent., but the limited business done would be at cheaper prices than this. The market is weak.

TERPINE HYDRATE is firm as offered at 1s. 8d. to 1s. 9d.; some holders are asking up to 2s. per lb.

Industrial Chemicals, etc.

London, September 5.

THE few movements in this market continue to favour buyers. The British makers of borax products notify a further material reduction in prices, and dealers have also brought their prices into line. Hypo soda is cheaper. Zinc oxides are about the only products which have advanced in price. Business continues slow and restricted in volume.

ACETIC ACID holds quite firm on spot with plenty of inquiry for the rather limited supplies available; 80 per cent. technical, £47; 80 per cent. pure, about £51; 98 per cent. glacial, £60 in casks and about £73 in glass demijohns, ex wharf, London.

ACETONE.—Opinion still favours higher prices in the near future, and spot offers are not at all free, at the firm prices of between £125 to £127 per ton, in drums.

ALUM remains quiet with dealers offering imported lump in casks at about £10 per ton.

AMMONIA (ANHYDROUS) has shown no life now that the buying season has finished; dealers quote in the region of 1s. 5d. per lb.

ARSENIC.—Widely divergent terms are heard of again for white Cornish powder, but the market is nominal in the absence of demand. This tends to keep the market on the easy side. The terms more representative of the latter are £63 to £65 London, according to quantity delivered at this end. In some quarters a somewhat firmer view is held of the market for imported arsenic, chiefly on account of uncertainty how the position may become affected by the non-fulfilment of Japanese orders still outstanding. Meanwhile terms for Japanese are nominal, and Grecian producers are talking of firmer rates for new shipments.

BARIUM CHLORIDE is at the moment steady at about £15 per ton for 98 to 100 per cent. with spot supplies restricted. Cheaper to come forward from the Continent.

BORAX.—On September 1 English refiners reduced the price of borax and boric acid by £2 per ton, borax glass by £4 per ton, and XXX preservative by £2 per ton. The new prices are: Commercial quality granulated borax, £24 10s.; crystals, £25; powdered, £26; extra fine ditto, £27; B.P. quality crystals, £29; powdered, £30; extra fine ditto, £31. Lump borax glass, £70; powdered, £71, in one-cwt. free tin-lined cases; preservative XXX, £80 per ton. For "boric acid" see "Pharmaceutical Chemicals."

COPPER SULPHATE.—The dullness of demand having been more pronounced, this combined with last week's further slump in metallic copper tended to accentuate

competition. Offers have been apparently made down to as low as £25 per ton for casks f.o.b., although a fair quotation is £25 10s. upwards for near shipment. Home demand is poor.

CREAM OF TARTAR is steady with fair sales being made at the firm rates of 87s. 6d. to 90s. per cwt., in one-ton lots.

EPSOM SALTS of commercial quality remain in poor request with dealers offering spot supplies at about £5 per ton, in bags.

FORMALDEHYDE.—The spot price quoted is more or less nominal at about £93 per ton. Practically all business is for forward delivery at about £75 per ton.

LEAD ACETATE is steadier after the reduction in dealers' prices recorded last week. Brown, £40; white, £41 per ton.

LITHARGE.—Dealers' prices are unchanged at about £35 10s. to £36 per ton with the market steady.

LITHOPONE holds up well with business as good as can be expected. 30 per cent. Continental red seal is offered by dealers at about £22 to £22 10s. per ton. Some brands are dearer.

POTASH CAUSTIC.—The spot position seems very unsteady with offers in some directions as low as £29. The average quotation is about £30 per ton for 88 to 92 per cent. in drums.

POTASSIUM CARBONATE.—The cheaper prices stated last week hold up fairly well, although the demand is still slow; 90 to 92 per cent., £26 10s. to £27; 96 to 98 per cent., £30 to £31 per ton.

POTASSIUM CHLORATE is dull and easy as quoted at about 3d. per lb.

POTASSIUM PERMANGANATE is a good feature with the price of 9½d. to 9¾d. per lb. well maintained. Inquiry has been good.

POTASSIUM PRUSSIAN is still on the quiet side with dealers' quotations at about 1s. 1d. per lb. The market seems fairly steady.

SODA CAUSTIC.—British makers continue to quote to domestic consumers on contract at the reduced prices stated last week: 70 to 72 per cent., £16 17s. 6d.; 76 to 77 per cent., £18 7s. 6d. per ton, in drums, carriage paid in Great Britain. Dealers have reduced their prices this week to: 70 to 72 per cent., £17 10s.; 76 to 77 per cent., £19 10s. per ton in drums, ex wharf, shipping port.

SODIUM ACETATE is a shade easier with little doing at about £24 10s. per ton.

SODIUM BICARBONATE.—British makers' prices are unchanged at £10 10s. per ton for refined in bags and £9 per ton for mineral water.

SODIUM BICROMATE from British makers for home trade only is steady at 4½d. per lb. Their prices for export are generally a little more.

SODIUM CARBONATE (washing crystals) from British makers for home trade only are unchanged at £5 5s. per ton, in bags, carriage paid to destination.

SODIUM CHLORATE shows little signs of activity with dealers quoting in the region of 2¾d. per lb.

SODIUM HYPOSULPHITE has weakened with pea crystals offering at about £14 10s. per ton, in one-cwt. kegs; commercial quality, on spot, is about £9 per ton, in casks or bags. Business has been poor.

SODIUM PRUSSIAN remains dull with dealers offering at about 6d. to 6½d. per lb.; business is slow.

SODIUM SULPHIDE in dealers' hands is moving only slowly with prices fairly well maintained; 60 to 62 per cent. solid, about £14; ditto, broken, £15; 60 to 65 per cent. concentrated, about £14 10s. per ton, in casks.

ZINC OXIDES.—British makers report to-day that on account of the continued advance in spelter, their prices for oxides have advanced to the following rates: B.P., £52 10s.; white seal, £44 10s.; green seal, £37 10s.; red seal, £36 per ton, f.o.r. makers' works.

COAL-TAR PRODUCTS, ETC.—Pitch has been quieter and is a little easier in price. Otherwise the market shows no change with business on the quiet side. ANILINE OIL AND SALT are better markets with more inquiry; 9d. to 10d. per lb., packages free. BETANAPHTHOL is maintained on a quiet market at 1s. 1d. to 1s. 2d. per lb.

PITCH has been quieter and values are slightly easier. The closing quotations were in the region of 135s. per ton, East Coast. Pure METHYL ALCOHOL holds well up to £100 per ton, ex wharf, London. CARBOLIC-ACID crystals have recovered a little with the market much healthier; firm at 1s. 2d. per lb., f.o.b. CREOSOTE OIL is now very steady as quoted at about 9½d. per gallon, f.o.b. CRESYLIC ACID is offering on a dull market at unchanged rates of 1s. 5d. to 2s. 4d. per gallon. PYRIDIN holds very firm with supplies scarce; fully 20s. per gallon. HEXAMETHYLENE shows no further fall on the quoted rate of about 3s. 9d. per gallon. DISINFECTANTS are unaltered on the week at 3s. 9d. per gallon. NAPHTHALENE is rather weaker but still quoted at about £20 per ton. Crude, £7 to £13; crystals, £23; powder, £17; balls, £24; tablets, £28; candles, £28 per ton, packages free. TOLUOL is now steady with makers quoting at 1s. 8d. to 1s. 9d. per gallon, f.o.r. works, in buyers' packages.

Fixed Oils, etc.

A GENERAL improvement is recorded during the week both as regards values and the volume of business. Acid oils are dearer; coconut, palm kernel and soya oils are improved markets; turpentine is easier. ACID OILS: Prices for most grades have appreciated during the week and business has been better. Coconut and palm kernel, 36s. 6d.; groundnut, 35s. 6d.; soya, about 35s.; all spot. CASTOR: Prices quoted ex mills, Hull, are unchanged but nominal. Pharmaceutical, 56s.; first pressings, 51s.; seconds, 50s.; all spot, in barrels in not less than one-ton lots. COCONUT: This market has a better tone and seems likely to advance. Deodorised, spot, 47s.; Ceylon, 45s., c.i.f.; Cochin, 50s., c.i.f. COTTONSEED: Early in the week business was active and prices for all grades advanced. At the close these better rates held but the market was much quieter. Deodorised, 47s.; common edible, 45s.; soap-making, 41s.; crude, 37s.; all spot. GROUNDNUT: This market seems to have been practically inactive. Quoted values are: Deodorised, spot, 51s.; crude Oriental, 44s., c.i.f. LINSEED (raw, naked): After some better business over the week-end the market has been much quieter, but the improvement in values for all positions is, so far, maintained. On spot, 40s. 6d.; September, 33s. 6d.; September to December, 39s.; January to April, about 35s. Boiled linseed oil, on spot, is steady at 42s. 9d. PALM KERNEL: A much firmer tone is recorded, with values advanced. Deodorised, 45s.; crude, 39s.; all spot. PALM: A further slight advance in values took place early in the week, and at these better levels the market is very steady; business has been satisfactory. Lagos, 35s. 6d.; softs, 35s.; mediums, 35s. 6d.; hards, 35s. 6d.; bleached, 38s.; all spot. RAPE: The dull tone reported last week continues, with quoted values unchanged. Refined, 42s. 6d.; crude, 39s. 6d.; all spot. SOYA: A sharp jump in values has taken place here, with the market closing firm. Deodorised, 44s.; crude, 36s.; all spot. TURPENTINE: The home trade demand having again been listless and sellers more inclined to give way in view of the considerably larger quantities which have become available at this end, now forward speculative interest has been checked and the trend of the market in the earlier part of this week was distinctly easier and irregular. The premium on January and April contracts has been reduced to about 2s. per cwt., while spot delivery could be secured at below 69s. 6d.; September-December, 70s.; and January-April, 72s. per cwt. The London warehouse stocks have been swelled to about 18,000 barrels, and we understand that some 8,000 barrels are now afloat from the United States. Quotations in America have shown some resistance, but it looks as though there were room for a further fall until a revival of interest ensues. WOO OIL: Chinese is inactive at 90s. per cwt. on the spot and 86s., i.f., for September to October shipment.

English Peppermint Oil

A PARAGRAPH of a somewhat misleading character appeared in "The Times" and other newspapers last week to the effect that the peppermint farming industry in England had fallen into decay owing in a large measure to foreign competition. This, however, is not the case, as we are informed by Stafford Allen & Sons, Ltd., that they have been large growers of the herb for over 75 years. There are also other well-established firms, including W. Ransom & Son, Ltd., of Litchin, and we are informed by Francis Newbery & Sons, Ltd., that John Jackson & Co., Mitcham: (for whom Newbery's are sole selling agents), are and have been for very many years large growers of peppermint at their farms at Litcham and Banstead, Surrey. The misapprehension in

regard to the alleged decay of this industry arises from the fact that the "Times" stated that White, Tomkins & Courage have laid out a peppermint farm and distillery near Reigate. They inform us that they intend to extend the cultivation of peppermint in future, and that probably lavender will also be grown for its oil.

Pimento Leaf Oil

IN the annual report of the Jamaica Department of Agriculture for the year ended December 31, 1922, which has just been received, reference is made to the results of marketing pimento leaf oil. The report states: A commercial test of the market for pimento oil was made by consigning 150 lb. of pimento leaf oil, prepared by the industrial chemist, to the London market. Unfortunately, our shipment coincided with a heavy fall in the market for cloves involving clove oil and all eugenol oils in the drop in prices. Our oil which had sold in London for 10s. per lb. in 1921 only sold for 5s. 6d. per lb. at the close of 1922. At this price there is no adequate inducement for the development of a pimento leaf oil industry in Jamaica. If, however, the markets recover there is no doubt that large quantities of pimento leaf oil could be produced in favourable areas so as to compete with clove oil as a source of eugenol. It may be recalled that a factory was to be established in the central portion of the island to produce the oil which, it was believed, would find a ready sale abroad. (*C. & D.*, I., 1922, p. 753.)

Cascara Sagrada

Judging from advices which have been received in London from the Pacific Coast, it would appear that a large proportion of the two to three year old bark warehoused at the Coast was disposed of to manufacturers early in the year, so that when the new peeling season commenced there was little old bark left. In addition to this, labour has been attracted by the lumber mills throughout the North-West, which have been running full time, and as up to \$9.00 per day can easily be earned, very little labour has been available for peeling cascara. Another factor leading to high prices is that the cascara tree is becoming more inaccessible, those growing near railroad shipping points having been cut down, so that more haulage is required to collect supplies from more distant points. Those who deal in a large way with the bark at the source intimate that supplies are difficult to get, it being possible only to pick up a few hundred pounds here and there, no mention being made of car loads. (A car load is about five tons.) The peeling season ended on September 1, and it is reported that the only supply available for the next year will be the bark peeled during July and August.

French Chamomiles

THE gathering of the crop (says a Paris report) has commenced in the departments of the Maine and Loire and is proceeding in that of the Nord, accompanied by the same exaggerated demands and excessive quotations as last year. However, all reports agree in promising a satisfactory crop in Anjou, in Northern France, and even in Belgium. Nevertheless, everybody concerned, both peasants and dealers, are demanding exorbitant prices. In Maine and Loire 29 to 35 fr. and in the Nord, where at first prices ranged from 15 to 20 francs, to-day 32 to 35 fr. is being asked. These prices are certainly exaggerated, particularly since the gathering of the crop in the Nord has only now commenced and lasts generally until the middle of October. In order to show the strange mentality of certain dealers, we reproduce a passage from a letter written by a collector of chamomiles in the Maine and Loire: "I cannot agree to selling my stock at 29 fr. per kilo. I know that this is an extremely high price, but since there is so little of it I prefer to wait. Further, I believe that the Belgians have advanced their prices and now quote 29 francs. I am in no hurry to sell; I have a whole year in which to get rid of the few thousand kilos, which I hold, and the year will be a long one." But a matter of graver import is the fact that some collectors and dealers of the Maine and Loire have gone to the Nord, where they have succeeded in talking over the local growers to agree to adopt their prices, that is to say, to demand 30-35 fr. These are reprehensible manoeuvres which deserve to be stigmatised. Before making these facts generally known we think it advisable to inform our clients in order to place them on their guard against paying in haste such exorbitant and unjustifiable prices. We believe that most of our fellow-dealers are animated by the same sentiments, and are holding aloof from the market, a tactical course, which, in our opinion, is the best in the circumstances.



Purchasing Drugs for China

SIR,—The article in last week's issue under this title calls, we think, for some comment. We should like to say, in the first place, that Mr. Cameron must have been exceedingly unfortunate in his importations from England if the average breakage amounted to 10 per cent. We have been shipping to all parts of China for very many years, and on reference to our claims book we find that claims for breakages have been very rare and for quite trifling amounts. We are quite sure we should have heard from our clients if in any instance the breakage had amounted to such an excessive figure as 10 per cent. Last year we sent a consignment of 53 cases to Moukden in Manchuria, which, owing to the disturbed conditions in China, was not taken up, and we consequently had the goods sent back to Shanghai. We have just received a report from our Shanghai house on this consignment, and we find that out of over 400 different items there are only five bottles broken. We still have part of these goods in Shanghai, and shall be very pleased to let Mr. Cameron have a list of them if he so desires. It is news to us that American prices are cheaper than English, and this statement does not tally with reports we get from China. We should like to make Mr. Cameron a sporting offer. If he will send us an order we will undertake to get the goods away within four weeks of date of receipt (provided, of course, shipping is available), that on the whole our prices are at least as cheap as those of any representative American house, and we will agree to send him immediately a bank draft for the value of any breakage, provided he sends the usual survey certificate. Mr. Cameron states that no special advantage was gained by the fall of the mark. Of course, that would be so if the invoice was in sterling; but has Mr. Cameron ever thought of how this affects the German manufacturer? By selling in sterling he is able if necessary to quote prices below actual cost, knowing full well that by the time payment is made he will have made a profit of a few hundreds or even thousands per cent., owing to the further depreciation of the mark. Mr. Cameron states that the lowest price he received from England for anæsthetic ether was Mex. \$2.50 per lb. Apparently he cannot have received the quotation we sent him on September 23, 1921, which was very considerably less than \$2.50 per lb. The list of comparisons submitted can hardly be called a representative one, as it omits altogether such everyday articles as bismuth salts, iodides, mercurials, quinine salts, and strychnine salts, for which our prices are competitive not only with Germany but also with those of any other country.

Yours faithfully,

Battersea, London, S.W.

MAY & BAKER, LTD.

Insurance Dispensing Difficulties

SIR,—Your "leader" in THE CHEMIST AND DRUGGIST of August 25 on Insurance dispensing difficulties is most helpful, but I agree with "Xrayser II." that the method of dealing with irregularities outlined in the last paragraph is neither practical nor likely to decrease the issue of "irregular prescriptions." The duty of a Pricing Office is to price prescriptions, and not to act as a buffer between the doctor and the chemist. If the chemist for any reason does not wish to take up the matter himself, he should report it to his Pharmaceutical Committee, who will raise the question with the Insurance Committee. May I remind you that every Insurance Committee is required to constitute a special subcommittee, which is known as the "Joint Services Subcommittee"? This is composed of a neutral chairman, two chemists from the Pharmaceutical Subcommittee, two doctors from the Medical Service Subcommittee, and two persons from the members of the Insur-

ance Committee who represent insured persons. This subcommittee deals with all cases involving both medical and pharmaceutical considerations. Ample provision is made in the National Health Insurance Acts for dealing with grievances either as between doctor and chemist, doctor and insured person, or chemist and insured person, and it is to be regretted that chemists as a rule are so reluctant to avail themselves of the machinery specially set up to deal with complaints and grievances—real or imaginary—and prefer an oblique method of rectification.—Yours faithfully,

"PHARMACEUTRIA" (4/9).

SIR,—While agreeing in the main with "Xrayser II.'s" views on the best way of treating irregular prescriptions (*C. & D.*, September 1, p. 329), I should be interested to know if he has ever had a customer who has laid a complaint against a doctor on this or any other account. My experience has been that the average insured person stands in a certain awe of his doctor. "Xrayser II." is sometimes almost apologetic for the panel doctor; but there is no question that, in general, private complaints as to treatment are very numerous; and even the friendly societies, which are supposed to be working for the transfer of dispensing from the chemist to the doctor, are almost unanimous in their condemnation of the method of medical service. To consider a case which every panel pharmacist could quote: an insured person receives a script for "mist. pot. brom.," and has it repeated for several weeks; then he sees an assistant or partner and asks for a bottle of the same medicine. The question is generally, "What colour was the mixture?" "Oh, like water, doctor," is the reply; so he gets a new script for "mist. strychn. acid." How is the patient to complain? The mixture tastes differently, and he tells the chemist so; but the chemist is unable to let him know the reason, as that would be criticising the doctor and might lead to difficulties.—Faithfully yours,

NEGLECTED (4/9).

Chemicals in Bond

SIR,—Just a comment from one of your subscribers in Canada in respect of the Trade Report and prices mentioned therein. Formerly, when Britain was a "free trade" country, the prices mentioned in your Trade Report were very useful to us, as they represented what one might call the "open market" price for the article referred to; but since import duties have been placed on so many items entering Britain your prices obviously include such tax or duty, and as your subscribers outside Britain, or rather the British Isles, would get their shipments, even if made from England but covering foreign merchandise, "in bond," your trade report so far as pharmaceutical chemicals is concerned has less value, and we wonder if it would not be possible to arrange it so that the "in bond" figures could be arrived at.—Yours respectfully,

MONTREAL IMPORTERS (31/8).

[The chemicals which were formerly imported free of duty and are now liable, under the Safeguarding of Industries Act, to an *ad valorem* duty of 33½ per cent., cannot be put "in bond," the importers being called upon to pay the duty immediately the goods are entered and cleared at Customs. The British Chemical and Dyestuff Traders' Association have been taking this matter up with the Treasury and the Customs, and we published in our issue of August 11 (p. 259) a memorandum, which they have forwarded to the Treasury, asking that a system of "bonding" should be introduced in place of the present unsatisfactory conditions. We understand that the Association are at the moment awaiting a reply to their suggestion. Should the authorities agree to adopt the proposals made, it will then be possible to state "in bond" prices in our Trade Report. For the time being, and under the present conditions of payment of import duties, we believe the prices stated in our Trade Report are presented in the most useful manner for the information of overseas buyers.—EDITOR.]

Latin in Pharmacy

SIR,—This question of Latin (the language of medicine from the earliest period) having been eliminated, by a strange aberration of the authorities, from the pharmaceutical Preliminary, is only part of a larger matter. "Patient, mild and subdued class of people" we are, says Mr. F. C. Heron, and he might have added to the above adjectival description, "feeble and flabby." If my recollection serves, the opposition to the suggested alteration was not of much volume. I did my bit, being always much of the opinion of "Latinite." The advent of school boards, with their modified and curious syllabus, probably startled some of our old chemists, who saw the supply of apprentice labour in prospect of being cut short. I was taught Latin at school, but did not tackle Caesar until, as an apprentice, I found myself up against the old requirements. I, and others, did not like it, but it never occurred to us to amalgamate and protest. We ought to have addressed the authorities and threatened to "turn grocers" if the examination was not altered at once to suit our capacity. The terms "feeble" and "flabby" might also, I think, be applied to the educational authorities. Faddists abound in education departments, as the teachers know to their own discomfort. To alter to suit the capacity of the student is to argue downwards, as the capacity is always that of the least intelligent. For my own part, I should like to see the B.P. in Latin, but I suppose that would be too big a strain. At the same time, it might have the effect of greatly raising our status as pharmacists. The idea of magistrates and local F.D.A. officials having to wade through a volume of pharmaceutical Latin is rather alluring. Most of our troubles are the result of cheapening, lowering, and commercialising pharmacy.

I am, etc.,

VETERAN (28/8).

Legal Queries

H. S. (21/8).—The words "Digestive Mixture" not amplified in any way do not render a medicine to which they apply liable to medicine-stamp duty. (See *C. & D. Diary*, 1921, p. 264.)

Rhei (25/8) asks whether any rebate is allowed to an insured person who has regularly paid his National Health Insurance contributions without having drawn any benefits. [No rebate is allowed.]

R. & M. (28/7).—An "entire" drug which is, or has been, the subject of a patent may be sold unstamped by chemists or by other persons who hold medicine licences. The preparations made from it (ointment, lotion, etc.) when recommended for ailments require to be stamped.

A. W. H. (55/22).—COMPANY CHEMISTS must register the name of the qualified superintendent with the Pharmaceutical Society, 17 Bloomsbury Square, London, W.C.1, and if the company uses the title "chemist," the name of the qualified director required by the Poisons and Pharmacy Act, 1908, Section 3 (4) (b).

Oxide of Zinc (27/8) asks whether the solicitor acting for the vendor upon the sale of property for £1,600 is entitled to charge £21. He was under the impression that the rate of remuneration was $1\frac{1}{4}$ per cent. [The scale charge is 30s. per cent. upon the first £1,000 and 20s. per cent. upon the second £1,000, so that a fee of £21 upon a £1,600 sale is correct.]

F. G. H. (7/8).—National Health Insurance prescriptions need not be entered in the prescription-book, but if containing "dangerous" drugs within the limits of the Dangerous Drugs Acts they must be entered in the D.D.A. register. The other exemption in the Regulations referring to Insurance prescriptions is that the address of the doctor need not be given on the prescription.

E. B. (18/6).—It is quite in order to sell tinct. opii diluted below the limits of the Dangerous Drugs Act, i.e., 95 m to 5j. The sale of the diluted preparation does

not come within the Regulations of the Dangerous Drugs Act, and no entry is required in the D.D.A. register, but the article is still a poison within the meaning of the Pharmacy Act, and Part I. conditions should be observed on the sale.

W. W. (25/8) understands that the tenant of a dwelling-house to which the Rent Restrictions Acts apply is protected from eviction until 1930. Is this correct? [The general provisions of the Acts continue only until June 24, 1925; but, from that date until June 24, 1930, a Court will have power to protect a tenant from eviction, in case of hardship, for such period and at such rent as it thinks proper.]

E. C. Co. (15/6).—LIQUID PREPARATIONS OF CARBOLIC ACID, containing not more than 3 per cent. of phenols, can be retailed by any trader if the vessel containing the preparation is labelled with the name of the substance, the word "poisonous," the words "not to be taken" (printed on the label), and the name and address of the seller. The containers must be rendered distinguishable by touch from ordinary bottles or containers.

Scotty (16/8) states that letters addressed to him and his fellow-assistants "care of" the firm by whom they are employed are opened upon the instructions of the manager. Have they any legal remedy? [In our view, the opening of letters by the firm, in the circumstances stated, is not illegal, and "Scotty" and his colleagues have no redress. If a letter addressed in the way stated and marked "personal" or "private" was opened by the firm, the addressee might have a cause of action, although it is improbable that a case would arise in which sufficient damage to justify legal proceedings could be proved.]

Subscribers' Symposium

For interchange of opinion among "C. & D." readers and brief notes on business and practical topics.

Hearing Apparatus

Does any reader know of a satisfactory hearing apparatus at a reasonable price?—R. W. B. (5/9).

Linimentum Terebinthine, B.P.

From his method of preparing linimentum terebinthine, B.P. (*C. & D.*, May 12, p. 666), one would hardly know whether Mr. Wm. Knight is writing as a veterinary surgeon or a pharmaceutical chemist when he says: "As the large quantity of soap is unnecessary to form a stable emulsion, and is, moreover, often irritating to delicate skins, the amount might reasonably be reduced, and the liniment would then be free from any tendency to gelatinise." Are we to believe that the soap would be more irritating than the turpentine by itself? I always thought that the camphor and soap were used to lessen the more and too irritating effect of the turpentine. Squire's "Companion" (1882) gives the formula as follows: Turpentine 16 pts., camphor 1 pt., soap 2 pts.; mix. In my opinion, the dispenser should have no difficulty in forming out of those quantities a neat and permanent emulsion, as the soap supplies all the moisture required. I should be glad to know what method Mr. Knight would adopt in compounding linimentum saponis, B.P. The Pharmacopœia says: "Mix the water with the spirit, add the other ingredients, digest and filter." But then that is only an official method, and requires a good deal more time to perform than the neat, accurate, official art of the skilful dispenser at his counter.—J. W. (15/5).

Appreciations

I cannot tell you what the *C. & D.* means to me out here; in fact, I should not care to carry on without it.—H. A. (13/8).

I have now had the *C. & D.* for a year, and I should like to congratulate you at this time on your splendid paper. I consider it an essential part of every chemist's education, and the *Diary* and Special number are really astounding. With every good wish for the future.—J. H. M. (6/8).

Miscellaneous Inquiries

When samples are sent particulars should be supplied to us as to their origin, what they are, what they are used for and how. We do not undertake to analyse and report upon proprietary articles nor to publish supposed formulas for them.

P. H. (10/7).—VETERINARY RECIPES.—The following contain a large number of formulas for veterinary medicines: Banham's "Veterinary Posology and Therapeutics"; Gresswell's "Equine Hospital Prescriber"; Gresswell's "Bovine Prescriber"; Finlay Dun's "Veterinary Medicines" (Douglas, Edinburgh). The first three are published by Baillière.

H. A. W. (26/6).—FERTILISERS.—The following from "Pharmaceutical Formulas" are worked out in percentages as desired:—

I.			
Ammonium nitrate	...	4 lb.	22.22
Ammonium phosphate	...	5 lb.	27.78
Potassium nitrate...	...	9 lb.	50.00
			100.00

Equivalent to nitrogen 20.6 per cent., ammonia 25.04 per cent., tri-calcium phosphate 32.62 per cent., potash 23.3 per cent.

II.			
Ammonium nitrate	...	64 oz.	40.51
Ammonium phosphate	...	32 oz.	20.25
Potassium nitrate	...	40 oz.	25.32
Ammonium chloride	...	8 oz.	5.06
Calcium sulphate	...	10 oz.	6.33
Ferrous sulphate	...	4 oz.	2.53
			100.00

Equivalent to nitrogen 23.31 per cent., ammonia 28.34 per cent., tri-calcium phosphate 23.78 per cent., potash 11 per cent.

CANINE (28/7).—(1) LIQUID SHAMPOO FOR WASHING DOGS.—

Coco-nut oil soap	...	1 oz.
Distilled water	...	4 oz.
Dissolve with heat and add:—		
Carbolic acid	...	20 drops
Eucalyptus oil	...	5 drops

Allow to stand and filter.

(2) **FLEAS IN DOGS.**—Many remedies have been suggested, but the following are probably the best:—

<i>Woodruff Hill's Lotion</i>			<i>Gamgee's Remedy</i>		
Sp. camph.	...	3j.	Ol. anisi	...	3j.
Ol. tereb.	...	3ss.	Ol. dulc.	...	3iv.
Ac. carbol.	...	xxx.			
Ol. dulc.	...	3iv.			

In either case the liquid is rubbed into the coat, allowed to remain for some hours (overnight is best) and then washed off with dog shampoo. Avoid the use of strong carbolic preparations.

H. A. (1/5).—LAXATIVE SYRUP FOR CHILDREN.—The following is an alternative preparation to syrup of figs:

Syr. rhei	
Syr. sennæ	... aa. p. æquales
Misce.	

The syrup of rhubarb for this preparation is best made by Lucas's method of macerating rhubarb root, 2 oz., in boiling distilled water, 15 oz., for twelve hours, straining, pressing and filtering on to sugar, 24 oz., and dissolving by heat. In place of coriander as a flavouring use peppermint, about five drops in rectified spirit, 1 dr., being needed for the above quantity of syrup. A similar modification of syr. sennæ could be made if the article is to be of a proprietary nature. We do not advocate the use of phenolphthalein as an addition to such a syrup, owing to the uncertainty of its action in certain circumstances.

H. S. (22/6).—LIQ. NITRITUM.—

Sodium nitrite	...	3j.
Old sweet spirit of nitre	...	3ij.
Glycerin	...	3ij.
Water	...	3xvj.

Mix. Dose: The same as spt. æther. nit.

H. T. W. (21/8).—We fear that the effect of hydrochloric acid spilt on cloth is irremediable.

X. Y. Z. (25/6).—BISMUTHATED MAGNESIA, P.F., is made as follows:—

Bismuth carb.	...	3ss.
Sodii bicarb.	...	3ij.
Magnes. carb. pond	...	ad 3ij.

Adult dose: Half a teaspoonful three or four times a day.

Used with the above title and reference this may be sold unstamped as a "known, admitted and approved" remedy.

H. L. (18/7).—HYPO ELIMINATOR.—There are several processes for removing traces of sodium hyposulphite from negatives or paper. The chief method is to immerse the plate or paper for a few minutes in the following solution:—

Ammonium persulphate	...	3ss.
Sodium carbonate	...	3j.
Water	...	3x.

Dissolve and use whilst fresh.

H. D. (20/8).—LIQUID NAIL POLISH.—

Putty powder,		
French chalk...	...	of each 1 oz.
Glycerin	...	3ss.
Carthamin	...	q.s.
Orange-flower water (triple) to...		3x.

Sift the powders through muslin, then rub them to a smooth cream with a little of the water and add the rest of the liquids. The carthamin is used for tinting purposes; it should be dissolved in a little spirit before adding to the bulk.

W. P. Ltd. (18/7).—EMULSION DIFFICULTY.—Your inquiry does not give the final bulk of the cod-liver oil emulsion in which you employ acacia and dextrin as emulsifying agents. We suspect that the proportion of the last-named ingredients is too low, and to this is due the separation that takes place on standing. A mixture of acacia and tragacanth is the favourite for this class of emulsion, but the use of the latter would add to the cost, which you do not desire to increase.

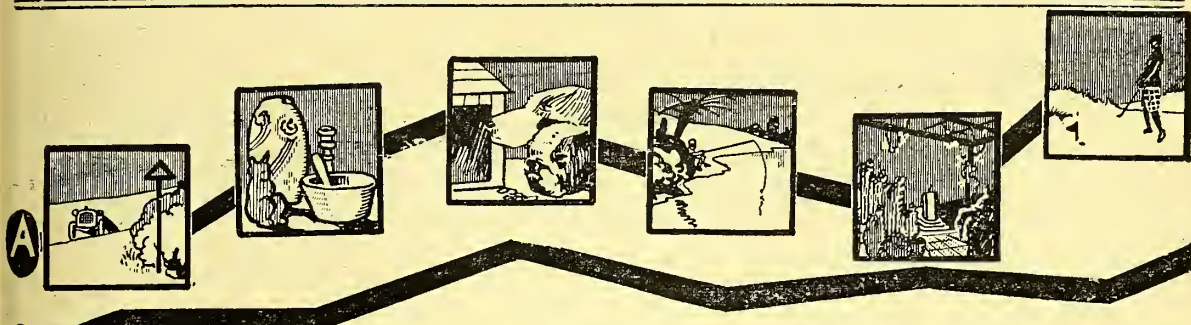
Desideratum (31/7).—BUSINESS BOOKS.—The following are published on the subjects you require: Smith's "Organising of a Small Business" (Pitman, 2s. 6d.); Whitehead's "How to Run a Shop" (Harrap, 10s. 6d.); Bromley's "How to Buy a Business" (Unwin, 2s. 6d.).

Retrospect of Fifty Years Ago

Reprinted from
"The Chemist and Druggist," September 15, 1873

Proctor's "Practical Pharmacy"

From a review of this book: Pharmacy is the study of remedial agents—their manufacture, and their best modes of combination. The work before us emanates from an essentially practical man; he describes what his own eyes have seen and his own hands have made. The results enumerated, some of which are in an unfinished state, are not so much an arranged recapitulation of the researches of previous investigators, as the records of the author's personal experience. This is the key to the whole book, which is not a didactic essay, but a thoughtful explanation of facts, phenomena, and suggestions which, in the daily practice of a druggist's business, have crossed the writer's mind. "The aim," says the preface, "most constantly and most prominently before my mind, was to educate, rather than to instruct my class; to expand and develop their ideas of the nature of our calling, and give vitality to its scientific character, rather than to store their minds with an accumulation of facts, cut, dried, and classified in natural orders like a herbarium." Much is it to be regretted that this choice seed seemed at Newcastle to be scattered on most thankless soil; and we congratulate Mr. Proctor on having ventured on a wider field, from which he may hope with confidence to reap the harvest which is his due. Twenty-nine lectures are included in the volume. The first set relates to various pharmaceutical operations, such as Communion, Precipitation, Distillation, and Percolation. The second series is devoted to Official Pharmacy, a knowledge of which in all its bearings is of the utmost importance to the pharmacist.



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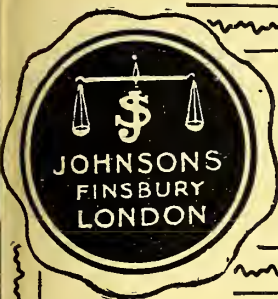
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SEPTEMBER SUPPLEMENT

The Prices given below are alterations in either the Cost or Selling Prices since the issue of the C. & D. Retail Price List in THE CHEMIST AND DRUGGIST, July 7, and enable Chemists to revise the Price List up to September 1. The method of using the Price List is explained on the front page of the quarterly publication.

	Cost	Selling Price (solid or liquid)							Cost	Selling Price (solid or liquid)					
		1 lb. or as stated	16 oz.	4 oz.	1 oz.	1 dr.	Gr. or ʒ			1 lb. or as stated	16 oz.	4 oz.	1 oz.	1 dr.	Gr. or ʒ
cantharidis .. C	4 0	—	2 3	0 6	—	—	—	Cydoniæ semina	8 6	—	3 9	1 0	—	—	—
acetylsalicyl. ..	5 3	—	2 3	0 7½	0 1½	—	—	Dammar gum.	3 6	5 3	1 6	0 5	—	—	—
carbolic. cryst. B.P. C	2 4	3 6	1 0	0 4	—	—	—	Diamorphin. hyd. B, F dr.	4 1	—	—	—	7 3	0 4	—
carbolic. liq. B.P. C	2 2	3 3	1 0	0 4	—	—	—	Elix. aletridis B.P.C. ..	5 9	—	2 7	0 9	—	—	—
citricum	2 8	4 0	1 2	0 4	—	—	—	Elix. formatum B.P.C. ..	5 0	—	2 3	0 7	0 1	—	—
citric. pulv.	2 9	4 2	1 3	0 4½	—	—	—	Elix. phosphori B.P.C. ..	5 6	—	2 8	0 9	—	—	—
agar shredded	11 9	—	5 2	1 6	—	—	—	Emp. ammon. c. hydrarg. ..	8 0	—	3 6	0 11	—	—	—
agar pulv.	14 0	—	6 0	1 8	—	—	—	Emp. hydrarg. .. C	4 6	—	2 0	0 6½	—	—	—
Capensis pulv.	1 7	2 4	0 8½	—	—	—	—	Emp. mentholis	12 9	—	5 2	1 5	—	—	—
Socot. pulv.	6 0	9 0	2 7	—	—	—	—	Emp. opii B	5 6	—	2 6	0 9	—	—	—
non. phosphas	3 3	4 6	1 4	0 5	—	—	—	Ext. aletridis liq. B.P.C. ..	15 0	—	6 6	1 9	0 4	—	—
yl acetat pur.	4 9	—	2 0	0 7	—	—	—	Ext. cascar. sag. sicc. ..	10 0	—	4 6	1 3	0 3	—	—
yl acetat coml.	4 0	6 0	1 10	0 6½	—	—	—	Ext. cascar. sag. liq. ..	3 0	4 9	1 7	0 5	—	—	—
yli pulv. (maize) .. cwt.	36 0	7 1b.	3 4	—	—	—	—	Ext. casc. sag. liq. '98 ..	2 10	4 7	1 5	—	—	—	—
hem. flor. exot.	6 9	10 2	2 10	0 9	—	—	—	Ext. casc. sag. liq. insip. ..	4 6	6 9	2 0	0 7	—	—	—
hem. flor. exot. pulv. ..	7 9	—	3 3	0 10½	—	—	—	Ext. convallariæ liq. ..	13 0	—	5 7	1 6	0 3	—	—
hem. flor. exot. sec. ..	5 9	8 8	2 6	0 8	—	—	—	Ext. ipecac. acet. pulv. ..	4 0	—	—	7 0	1 2	—	—
na fœniculi conc. 1-40 ..	15 0	—	6 6	1 10	0 4	—	—	Ext. opii liq. B, F	5 3	—	2 4	0 8	—	—	—
enti nucleinas	4 3	—	—	7 6	1 3	—	—	Ext. opii sicc. B, F oz.	5 0	—	—	7 6	1 6	—	—
am. tolu.	12 0	—	5 2	1 6	0 4	—	—	Fœnugr. sem. pulv. (crs.) cwt.	60 0	0 10	—	7 lb.	5 6	—	—
chlorid. pur.	1 4	2 0	0 7	0 2	—	—	—	Gelatin. sheet No. 1	5 0	7 6	2 2	0 7	—	—	—
ndulæ flor.	5 0	—	2 3	0 9	—	—	—	Gelatin. incis.	7 0	10 6	3 0	0 10	—	—	—
rbogia	9 0	—	4 0	1 0	—	—	—	Gentian. rad. incis.	1 0	1 6	0 6	0 2	—	—	—
rbogiæ pulv.	11 0	—	4 9	1 3	—	—	—	Gentian. rad. pulv.	1 2	1 10	0 7	0 2	—	—	—
aphora (flores)	5 9	8 9	2 6	0 8½	—	—	—	Glycyrrh. rad. decort. ..	2 0	3 0	1 0	0 3½	—	—	—
ellæ cort. pulv.	6 4	—	2 10	—	—	—	—	Guaiacol. benz. oz.	3 3	—	—	6 0	1 0	—	—
ui fructus	2 0	3 0	0 10½	0 3	—	—	—	Hyd. bisulphid.	6 10	10 3	3 0	0 9½	—	—	—
ui fruct. pulv.	2 9	4 2	1 3	0 4	—	—	—	Hyd. iodid. rubr. .. C oz.	1 7	—	—	2 4½	—	—	—
ui fruct. pulv. (coarse) ..	2 6	3 9	1 1	—	—	—	—	Hyd. iodid. virid. .. C oz.	1 7	—	—	2 4½	—	—	—
chonidina oz.	5 6	—	—	9 0	1 8	0 7*	—	Hyd. oleas '98	7 6	—	3 2	0 10½	—	—	—
chonidina hydroch. .. oz.	4 0	—	—	7 0	1 2	0 5*	—	Hyd. oleas 10%	4 6	—	2 0	—	—	—	—
chonidina sulphus .. oz.	4 0	—	—	7 0	1 2	0 5*	—	Hyd. oxid. flav. C	7 0	—	—	0 10	—	—	—
chonina hydroch.	2 3	—	—	4 0	0 9	—	—	Hyd. oxid. rubr. C	7 3	—	—	0 10	—	—	—
chonina sulph. oz.	2 3	—	—	4 0	0 9	—	—	Hyd. perchlorid. B	5 6	—	—	0 8	—	—	—
aina B, F dr.	5 3	—	—	—	7 3	—	—	Hyd. persulph. (alb.) ..	5 8	—	2 6	0 8	—	—	—
aina hydrochlor. B, F dr.	4 4	—	—	—	6 6	—	—	Hyd. subchlorid.	6 2	—	—	0 9	—	—	—
leina B dr.	4 0	—	—	—	6 6	—	—	Hyd. sulph. c. sulph. ..	6 10	—	3 4	0 10½	0 2	—	—
leina phosphas B dr.	3 2	—	—	—	6 4	—	—	Hydrargyrum	5 0	7 6	2 2	0 7	—	—	—
leina sulphas B dr.	3 4	—	—	—	6 8	—	—	Hyd. ammon. C	6 10	—	3 0	0 9	—	—	—
osoti carbonas oz.	1 3	—	—	2 3	0 5	—	—	Hyd. cum creta	2 8	—	1 2	0 4	—	—	—
tæ Gall. pulv. cwt.	30 0	7 1b.	2 9	14 lb.	5 0	—	—	Hyoscyamina cryst. .. B gr.	0 5	—	—	—	—	—	0 10

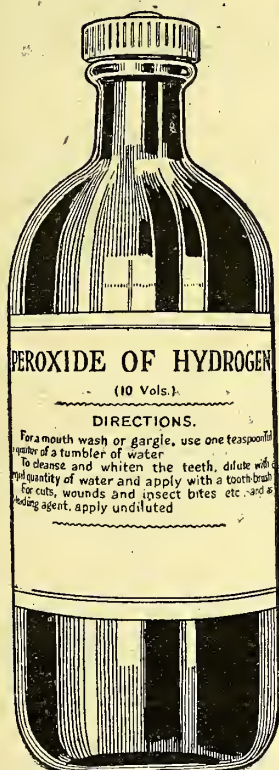
	Cost	Selling Price (solid or liquid)							Cost	Selling Price (solid or liquid)					
		1 lb. or as stated	16 oz.	4 oz.	1 oz.	1 dr.	Gr. or 1/2			1 lb. or as stated	16 oz.	4 oz.	1 oz.	1 dr.	Gr. or 1/2
Hyoscyaminæ hydbr. B gr.	0 5	—	—	—	—	—	0 10	Potassa caustic. (black ash) ..	2 0	3 0	0 10 1/2	—	—	—	—
Hyoscyaminæ sulph. B gr.	0 5	—	—	—	—	—	0 10	Potassii benz. synth. .. oz.	0 8	—	—	—	1 2	0 3	—
Inject. morph. hypod. B, F oz.	1 6	—	—	—	3 0	0 9	—	Potassii ferricyan. coml. ..	5 6	8 3	2 4	—	—	—	—
Lin. sem. contus. .. cwt.	40 0	7 lb.	3 8	14 lb.	7 0	—	—	Potassii nitras coml. .. cwt.	66 0	7 lb.	6 0	14 lb.	11 6	—	—
Lin. A.B.C. .. B	9 0	—	3 10	1 1	0 2	—	—	Potassii tartras acid. ..	1 4	2 0	0 7	—	—	—	—
Lin. methyl salicyl. ..	8 0	—	3 6	—	—	—	—	Pulv. cinnam. co. ..	5 9	—	2 6	0 9	0 1 1/2	—	—
Lin. methyl salicyl. co. ..	9 6	—	4 2	1 3	0 2 1/2	—	—	Pulv. jalapæ co. ..	6 0	—	2 7	0 9	0 1 1/2	—	—
Lin. opii .. B, ex F	6 9	—	2 10 1/2	0 9 1/2	0 2	—	—	Pulv. kino co. .. B, ex F	9 0	—	3 10 1/2	1 1	—	—	—
Lin. opii meth. .. B, ex F	3 6	—	1 7	0 6	—	—	—	Quassia lig. rass. ..	0 10	1 3	0 4 1/2	0 2	—	—	—
Lin. opii ammon. .. B, ex F	8 9	—	3 9	1 0	0 2	—	—	Quebracho cort. ..	3 6	—	1 7	0 6	—	—	—
Liq. euonymi et cascaræ ..	8 0	—	3 6	1 0	—	—	—	Santoninum .. oz.	60 0	—	—	—	17 0	0 4	—
Liq. formaldehydi ..	1 6	2 3	0 8	0 2 1/2	—	—	—	Sapo mollis virid. ..	1 6	2 3	0 8	0 2 1/2	—	—	—
Liq. morph. acetat. .. B, F	5 3	—	2 7	0 9	0 2	—	—	Serpentaria rhizoma ..	8 0	—	3 5	1 0	—	—	—
Liq. opii sed. B.P.C. .. B, F	7 6	—	3 6	1 0	—	—	—	Shellac alb. ..	5 6	8 3	2 5	0 8	—	—	—
Lobelia ..	2 0	3 0	0 10 1/2	0 3	—	—	—	Shellac aurant. ..	5 6	8 3	2 5	0 8	—	—	—
Lobelia pulv. ..	3 2	4 9	1 4	0 4 1/2	—	—	—	Shellac aurant. sec. ..	3 5	5 2	1 6	0 5	—	—	—
Magnes. sulph. coml. .. cwt.	17 0	7 lb.	1 8	14 lb.	3 0	—	—	Sodii cinnam. .. oz.	1 3	—	—	2 6	0 5	—	—
Morphina pur. .. B, F dr.	3 7	—	—	—	6 6	—	—	Sp. camphoræ ..	6 0	—	2 4	—	—	—	—
Morph. acetas .. B, F dr.	2 8	—	—	—	5 0	—	—	Sp. saponatus ..	6 0	9 0	2 7	0 9	—	—	—
Morph. bimeconas .. B, F dr.	3 6	—	—	—	6 6	—	—	Sp. vini meth. 64 o.p. gal.	5 0	0 11	0 3 1/2	—	—	—	—
Morph. hydrochlor. .. B, F dr.	2 8	—	—	—	5 0	—	—	Succ. limetta .. gal.	7 0	1 3	—	—	—	—	—
Morph. tartras .. B, F dr.	3 6	—	—	—	6 6	—	—	Sulphur viv. ..	0 4 1/2	0 7	0 2 1/2	—	—	—	—
Ol. anisi stellat. ..	3 6	—	1 7	—	—	—	—	Sulphur viv. .. cwt.	28 0	7 lb.	2 6	—	—	—	—
Ol. carbolic. 5 per cent. C	1 9	2 8	0 10	0 3	—	—	—	Syr. chloral ..	2 6	—	1 7	—	—	—	—
Ol. cinereum .. oz.	0 8	—	—	1 0	0 2 1/2	—	—	Syr. tolutanus ..	1 6	—	0 10	—	—	—	—
Ol. citronellæ .. oz.	0 8	—	—	1 2	0 2 1/2	—	—	Terebenum ..	4 6	—	1 9	0 6	—	—	—
Ol. eucalypt. ..	3 6	5 3	1 7	—	—	—	—	Thymol. carbonas .. oz.	6 6	—	—	11 4	2 0	0 8*	—
Ol. eucalypti glob. ..	3 9	—	1 8	0 6	—	—	—	Tr. cascaræ ..	6 10	—	2 9	—	—	—	—
Ol. geranii Gall. .. oz.	6 0	—	—	10 6	1 10	—	—	Tr. opii .. B, F	5 9	—	2 4	—	—	—	—
Ol. lavand. ab flor. ..	28 0	—	—	3 3	0 6	—	—	Tr. opii B.P. '98 .. B, F	5 6	—	2 3	—	—	—	—
Ol. lavand. Gall. ..	24 0	—	—	2 10	—	—	—	Tr. opii ammon. .. C	6 7	—	2 7	0 8 1/2	—	—	—
Ol. lini opt. .. gal.	6 9	pint	1 4	—	—	—	—	Tr. opii aq. (1% morph.) .. B, F	4 9	—	2 4	—	—	—	—
Ol. lini (boiled) .. gal.	7 3	pint	1 5	—	—	—	—	Tr. opii crocata .. B, F	15 0	—	6 0	1 6	0 3	—	—
Ol. neroli .. oz.	36 0	—	—	—	—	0 3	—	Ung. boracis ..	2 6	3 9	1 2	—	—	—	—
Ol. olivæ (cream) .. gal.	15 6	3 0	0 10 1/2	0 3	—	—	—	Ung. calaminæ ..	2 3	3 6	1 0	—	—	—	—
Ol. olivæ (sublime) .. gal.	13 6	2 7	0 8	0 2	—	—	—	Ung. cantharidin. .. C	4 6	—	2 0	0 6 1/2	—	—	—
Ol. petitgrain .. oz.	1 8	—	—	3 0	0 6	—	—	Ung. cantharidis .. C	5 6	—	2 6	0 8	—	—	—
Ol. pimentæ exot. .. oz.	1 6	—	—	2 3	0 6	—	—	Ung. gallæ c. opio .. B, ex F	4 3	—	1 10 1/2	—	—	—	—
Ol. sassafras nat. ..	10 6	—	4 9	1 3	0 3	—	—	Ung. hydrarg. ..	3 2	4 9	1 5	0 4 1/2	—	—	—
Ol. terebinth. .. gal.	10 0	pint	2 0	—	—	—	—	Ung. hyd. co. ..	3 9	5 8	1 8	—	—	—	—
Ol. terebinth. rect. ..	2 8	4 3	1 3	0 5	—	—	—	Ung. hyd. oleat. ..	3 3	5 0	1 4 1/2	0 4 1/2	—	—	—
Opium Turc. .. B, F, oz.	2 6	—	—	4 3	0 9	—	—	Ung. opii B, F, oz.	1 4	—	—	—	—	—	—
Opii pulv. .. B, F, oz.	2 8	—	—	4 6	0 9	—	—	Ung. resorcini co. B.P.C. '11	4 6	—	2 0	0 6	—	—	—
Otto rosæ (virgin) .. dr.	8 6	—	—	—	16 3	0 5	—	Ung. zinci c. ac. boric. ..	2 0	3 0	0 10 1/2	—	—	—	—
Pasta zinci et gelat. B.P.C. ..	2 9	5 8	1 7	0 5	—	—	—	Vin. opii B, F	6 10	—	3 0	—	—	—	—
Phenacetinum .. oz.	0 11	—	—	1 6	—	—	—	Vin. pepsini ..	4 8	7 0	2 0	0 7	—	—	—
Pilocarpin. hyd. .. B gr.	0 3	—	—	—	—	0 6	—	Xylol rectific. ..	2 2	—	0 10	—	—	—	—
Pilocarpin. nitr. .. B gr.	0 3	—	—	—	—	0 6	—	Zinci oxid. (Hubbuck) ..	1 8	2 6	0 8 1/2	0 2 1/2	—	—	—
Podophyll. resin. .. oz.	3 2	—	—	5 6	—	—	—								

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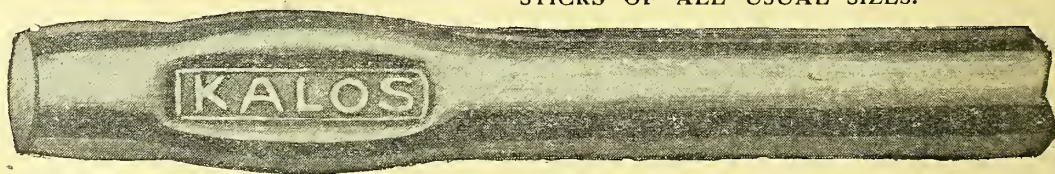
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To the Retail Chemists and
Druggists of Great Britain

DURING the period of the Great War we were unable to ship any of our Pharmaceutical Products to England, and their use and sale were very much reduced as a consequence.

We are now constantly detailing and sampling to the Medical Profession throughout Great Britain the following products with gratifying results.

The leading wholesale druggists of England are carrying a full stock of our preparations, and can therefore fill orders promptly from retail chemists at the following prices:

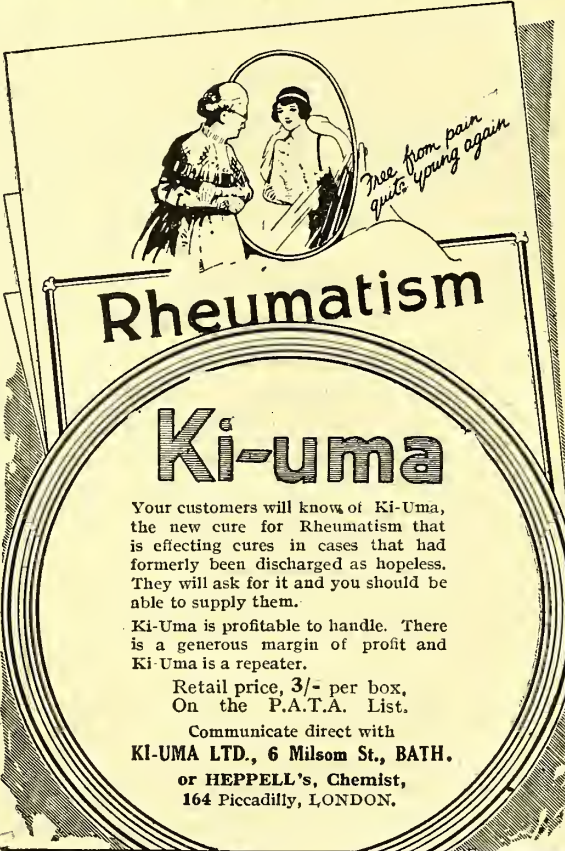
	Per Dozen	Suggested Price to Consumer
Cod Liver Preparation, 16 oz. stamped	76/-	8/-
Cod Liver Preparation, 8 oz. stamped	42/6	4/6
Phospho-Lecithin, 16 oz. unstamped..	70/6	8/-
Phospho-Lecithin, 8 oz. unstamped ..	38/6	4/6
Creo-Terpin, 16 oz. unstamped	80/-	9/-
Creo-Terpin, 8 oz. unstamped	43/-	5/-
Magma Magnesia, 16 oz. unstamped ..	26/6	3/-

MADE IN CANADA BY

HENRY K. WAMPOLE & Co., LTD.

Manufacturing Pharmacists,

PERTH, ONTARIO, CANADA.



Free from pain quite young again

Rheumatism

Ki-uma

Your customers will know of Ki-uma, the new cure for Rheumatism that is effecting cures in cases that had formerly been discharged as hopeless. They will ask for it and you should be able to supply them.

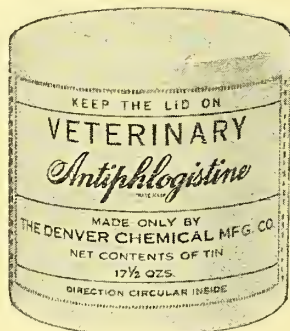
Ki-uma is profitable to handle. There is a generous margin of profit and Ki-uma is a repeater.

Retail price, 3/- per box, On the P.A.T.A. List.

Communicate direct with
KI-UMA LTD., 6 Milsom St., BATH.
or **HEPPELL's, Chemist,**
164 Piccadilly, LONDON.

Antiphlogistine

TRADE MARK



VETERINARY

for

**Laminitis (Founder)
Mammitis, Distemper
and other inflammatory conditions.**

Extra discounts on orders for £2 and over. Carriage paid on ALL orders.

Our "best terms" quotation will interest you. We invite you to write for it TO-DAY.

THE DENVER CHEMICAL MANUFACTURING CO.
St. Ann's Road, London, E.3.

NEW ZEALAND HONEY "IMPERIAL BEE" brand

Packed in 1's and 1/2's Glass & Monopots, etc.

Nature's own: Sweetmeat, Food, Medicine. Guaranteed pure. Stock the best and increase your trade.

A South Coast Retailer says:—

"We have had quite a successful display of **New Zealand Honey**. All our customers are quite delighted with the **Honey** and our business for this is increasing.

"We have no hesitation in recommending it and hope to do considerable business with it this summer."

From a Northern Sea-side Resort:—

"Everyone delighted with '**IMPERIAL BEE**' Honey."

Apply for full particulars and prices to:—

A. J. MILLS & Co., Ltd.

Produce and Canned Goods Dept.,

14, TOOLEY STREET, LONDON, S.E.1

Sole European Agents for:—

THE NEW ZEALAND HONEY PRODUCERS' ASSN. LTD.

NURSE HARVEY'S MIXTURE

A safe, simple, and reliable remedy for Children's Ailments is advertised so extensively in the daily and weekly Press as to bring mothers to the retailer without effort on his part.

The selling has been done before the mother reaches the chemist, and, having supplied her, it is only common sense to claim she will buy other family necessities from him. Moreover, the retailer has a profitable return on a quick turnover.

For Direct Terms apply to—

OSCAR SCRUTON & CO., YORK

GARFIELD TEA

PROMPT SHIPMENT

ALL SIZES

Phone or Write:

GARFIELD TEA CO.

44 Foxbourne Road,
BALHAM, LONDON, S.W.17.



Alspa Salts

A non-effervescent morning aperient. Nationally advertised and on the P.A.T.A.

Write for Special Bonus Terms for Window Display. Dummies, Showcards, Window Bills free on application.

Retails at

1/9

per Bottle.

TRADE TERMS.

1 doz.	..	15/-	per doz. net
3 "	..	"	" less 2 1/2%
6 "	..	"	" " 5%
12 "	..	"	" " 10%

Sole Agents and Distributors

FRANCIS NEWBERRY & SONS, LTD.
27-28 CHARTERHOUSE SQUARE LONDON E.C.1

PODOPHYLLIN RESIN, CHAULMUGRA OIL, HYDROCARPUS OIL, GURJAN BALSAM.

S. N. DE, M.Sc. (Botany), Post Box 7851, CALCUTTA.

Pyrogallie Acid Gallo Acid

Manufactured by **J. L. ROSE**

At ABBEY ROAD, BARKING, LONDON, E.

Wholesale and Export Only.

HOOPER & CO.

EVERY SUNDRY

FOR

EVERY CHEMIST.

HIRE DEPARTMENT

7 Pall Mall East, London, S.W.1

TELEphones: Regent 8066 (3 lines), grams: Superabound, Pacey, London.

NOW IS THE TIME TO ORDER

MASON'S EXTRACT OF HERBS

Newball & Mason
NOTTINGHAM



"Good! It's Mason's!"

SYRUP



(ROBERTS)

Recognised by the Medical Profession as

THE BEST TONIC.

Supplied in 8-oz. and 16-oz. Bottles by all the Wholesale Houses.

Inquiries Invited for
**NEW & RARE
MEDICINES**

of French, Italian and Russian Origin.

ROBERTS & CO.,
76 New Bond Street, London, W. 5 Rue de la Paix, Paris.

BISHOP'S NATURAL FRUIT SALINE

is now *reduced* to **19/-** per dozen, subject; the Retail Price remaining at **2/3** per bottle, P.A.T.A.

A Bonus is offered on orders for 6 dozen, or 12 dozen on consideration of Chemists giving a Window Display.

Attractive Showcards and Price-cards will be forwarded with each order.

BISHOP'S NATURAL FRUIT SALINE

is a business bringer. It sells well all the year round.

To the Chemist.—**11½d.** per bottle profit if you purchase one gross lots.

11d. per bottle profit if you purchase 6 dozen lots.

Bonus quantities forwarded carriage paid.

It pays to push BISHOP'S.

PREPARED ONLY BY

ALFRED BISHOP, Ltd., 48 Spelman Street, LONDON, E.1

REAL SILVER LEAF

As supplied for many years to the leading Houses for Pills, Cachous, &c.

We also supply

GOLD LEAF AND GOLD POWDERS

WHOLESALE ONLY.

E. WINTER & CO., LTD.

Head Office: 64 Cheapside, London, E.C.2. Telephone: Central 935



CACHETS "FINOT"

(White or Coloured)

With inscriptions in any desired tint; also Plain or Embossed.

"A distinction all their own."—C. & D.

"Perfection of Cachets."—Lancet.

These Cachets are especially adapted for Headache, Neuralgia and other powders.

COOPER, SON & CO. LTD., 80 Gloucester Road, SOUTH KENSINGTON.
In 17 Sizes to fit the various types of Cachet Machines.

BESORBON

(Dr. Hill's Formula)

**MEDICINAL SNUFF. ABSOLUTELY THE
FINEST REMEDY FOR CATARRH & COLD
IN THE HEAD.**

Richard Dickeson & Co. (Incorporated with Reynolds, Sons & Co., Ltd.)
57-59 CHARTERHOUSE STREET, LONDON, E.C.1.

What would happen to YOUR business if you were temporarily disabled by
ACCIDENT OR SICKNESS?

Your financial loss is bound to be great. Therefore,
safeguard yourself and your business by taking out a

PERSONAL ACCIDENT & SICKNESS POLICY

Issued by

THE LICENSES & GENERAL INSURANCE CO., LTD.

24, 26 & 28 MOORGATE, LONDON, E.C.2.

Sasso

Olive Oil



Preferred throughout the world

P. SASSO e FIGLI ONELGIA, ITALY.

The Largest Olive Oil Factory in Italy.

GRAND PRIX, GENOA 1914; SAN FRANCISCO 1915.
RIO DE JANEIRO 1923.

WHOLESALE ONLY.

Fredk. Boehm Ltd

15, 16, 17, JEWRY STREET, LONDON, E.C. 3.

Telephone: AVENUE 1365 (3 lines).

Telegrams: "BISSULA, TELEW, LONDON."

Telewriter: WALBROOK 596.

GLASGOW.

NEW YORK.

ZORBO Reg. Brand

ABSORBENT COTTON WOOL

Surgeon's Superfine Quality

THIS Surgical Dressing has been introduced with a view to meeting the demand for a really high-class cotton wool of British Manufacture.

It is made only from long staple cotton, is highly absorbent, and free from all impurities, and through every stage of manufacture the greatest care has been taken, and quality has been the first and only consideration.

To ensure the retailer a reasonable profit, and to protect his customers from the substitution of inferior qualities, "ZORBO" Cotton Wool has been placed on the P.A.T.A. List, so that our friends may have every confidence in pushing this All British Line.

SAMPLES ON APPLICATION

P.A.T.A. PRICES

		1-lb.	8-oz.	4-oz.	2-oz.	1 oz.
P.A.T.A. Public Price.	PACKETS ...	4/6	2/6	1/4	9d.	6d. each
Wholesale Price to Retailers	... ..	35/-	18/2	9/4	5/-	2/10 doz.
P.A.T.A. Public Price.	CARTONS ...	5/-	2/9	1/8	1/-	7½d. each.
Wholesale Price to Retailers	... ..	37/-	20/-	10/9	5/10	3½ doz.
P.A.T.A. Public Price.	SEALED TINS, STERILIZED ...	5/6	3/3	2/-	1/6	— each.
Wholesale Price to Retailers	... ..	42/-	22/6	12/6	8/-	— doz.

STERILIZED IN SEALED GLASS BOTTLES, 2-oz. ONLY.

P.A.T.A. Public Price	... ..	1/9 each.
Wholesale Price to Retailers	... ..	10/- per doz.

SOLE MANUFACTURERS:

ROBERT BAILEY & SON, LTD.
Marriott Street Mills, Stockport.

Manufacturers of Absorbent Cotton Wools; Bandages; Lints; Gauzes; Gauze
Tissues; Capsicum Tissue; First Aid Dressings and Equipments; Jewellers'
Wools; Wadding; "Zorbo" Pneumonia Jackets and Chest Protectors;
"Cynta" Ladies' Sanitary Specialities; etc., etc.

Contractors to Home, Colonial and Foreign Governments, Railways, Hospitals, etc.

Order through your usual wholesaler.

Telegrams: AYBELIM, FINSQUARE, LONDON."

Telephones: CLERKENWELL 1347-8-9

ARTHUR BERTON, LTD.

MANUFACTURERS

Showrooms
and
Warehouses

15 & 17 Worship Street - LONDON, E.C.2

84 Miller Street - - - GLASGOW

36 Chapel St., Victoria Bridge, MANCHESTER

MANICURE
AND
DRESSING
SETS

EBONY
TRINKET
SETS

New Patterns

for the

Coming Season

PUFF BOWLS
AND
SCENT
SPRAYS

HAIR
BRUSHES
AND
COMBS

Ensure obtaining best quality

SURGICAL OILED SILKS & COTTONS

by asking your wholesale house for

“MACBEANS”

the recognised high grade brand.

EDWARD MACBEAN & CO., LTD.

Manufacturers of Oil-proofed and Rubber-proofed fabrics of every description.

London Warehouse:

6/8 LIME STREET SQUARE

E.C.3

Telephone: 1995 Central.

Telegrams: "Stormproof, Fen, London."

Regd. Offices & Works:

WELLINGTON MILLS

PORT DUNDAS, GLASGOW

Telephone: 958 Douglas (2 lines).

Telegrams: "Diamond, Glasgow."



DR. SCHOLL'S PED-O-KUBE FOR THE FOOT BATH.

A refreshing antiseptic preparation for tender, hot and swollen feet. Retail price 2/- per box (One dozen cubes).

BIGGER BUSINESS

Dr. Scholl's Foot Comfort Appliances and Specialities are in ever increasing demand. By displaying them you will materially increase your custom and sales. "Scholl" goods show a generous margin of profit.



Write for Illustrated Catalogue.

The SCHOLL MFG. CO. Ltd.
1-4 Giltspur St., E.C.1

ELASTIC ANKLETS and KNEE CAPS FROM 24/- PER DOZEN

THE ALTRINCHAM RUBBER COMPANY
Kingsway, Altrincham.

BOOKS FOR PHARMACISTS.

Send us a postal card and we will send you a 32 page catalogue of professional and business books for pharmacists, and a copy of

"THE SPATULA"

an illustrated monthly magazine for druggists, full of American snap and enterprise.

THE SPATULA, BOSTON 14, MASS, U.S.A.



Advertising Balloons

SQUEAKERS,
DYING BOARDS,
SWANS, BIRDS,
ELEPHANTS, &c.

WHOLESALE & EXPORT
ENQUIRIES INVITED.
WE ARE ACTUAL MANUFACTURERS

JOSEPH HARRIS & COMPANY
RUBBER WORKS, BROADHEATH, ALTRINCHAM.

A VERY EFFECTIVE
FORM OF ADVT.
SPECIAL DESIGNS
SUBMITTED.

THE "MATER" CLINICAL

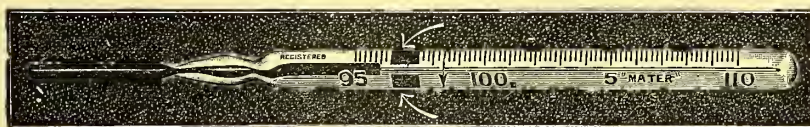
MAGNIFYING FRONT. NATIONAL PHYSICAL LABORATORY GUARANTEE.
EASY TO READ. EASY TO SHAKE DOWN.

This series of **Clinical** Thermometer is on the

P. A. T. A. LIST

AN ADEQUATE MARGIN OF PROFIT BEING GUARANTEED

REGISTERED No. 553038



PRICES OF THE "MATER" CLINICAL IN METAL CASES:—

Retail ... 2 min., 4/6; 1 min., 5/6; ½ min., 7/- each.
Wholesale .. 27/-; .. 33/-; .. 42/- per doz.

PERKEN, SON & CO., Ltd., 94 HATTON GARDEN,
LONDON, E.C. 1.

Established 1852.

Telephone: 724 Holborn.

Contractors to H.M. Government.

Telegrams: "Optimus, Smith, London."

Write for Prices of every description of **CLINICAL** and **OTHER THERMOMETERS**

Help for the Chemist-Optician



Thirty-six new designs for Advertising Blotters about eyesight; among them some that you can use profitably to stimulate sales in your Optical Department.

They are low in price, refreshingly original in conception and design, well printed. You may buy them in sets of six related subjects, or in a selection of single designs.

Purchase confers sole right to use them in your town.

Your request on a post card will bring a full range of samples of our Optical Advertising Matter, including Circulars. Will you write now?

SUTTLEY and SILVERLOCK, Ltd.

The Chemists' Printers

BLACKFRIARS ROAD LONDON, S.E.1.

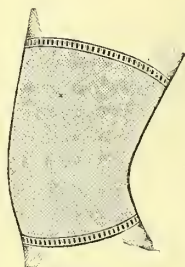
The SURGICAL HOSIERY Co. Ltd.

(Department B), RUSSELL STREET, NOTTINGHAM.

Manufacturers and Patentees of

SURCO SEAMLESS HOSIERY

In Light qualities for Summer wear, or Stout for hard wear.



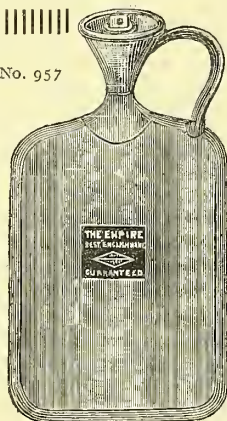
Price List and Measurement Forms on Application.

Knee Caps as supplied to Bolton Wanderers, winners of Association Cup, 1923.



Articles made to measure dispatched in 24 hours.

No. 957



The "EMPIRE" HOT WATER BOTTLES

Further Reductions in the Prices of the Grey Rubber Bottles

CHEMISTS who have built up a reputation for reliable Hot Water Bottles continue to order our well-known "EMPIRE" brand of these goods. Do not risk trying an unknown make.

There are plenty of light-weight Bottles on the market, but the "heavy-weight," as ours, wear much longer.

One quality only—the best. Guaranteed for two years.

For orders of 3 dozen lots we allow 5% special discount.

	Heavy make	Sizes each	PRICES as follows:—							
			6×8	6×10	6×12	8×10	8×12	8×14	10×12	10×14 in.
	Grey rubber		3/-	3/2	3/4	3/6	4/-	4/4	4/6	5/3
	Red rubber	"	3/8	4/-	4/4	4/8	5/-	5/6	5/9	6/6

Each bottle in a strong paper bag with directions for use.

	Scarlet or grey plush ea.	Sizes each	COVERS							
			6×8	6×10	6×12	8×10	8×12	8×14	10×12	10×14 in.
	Velour, assorted colours (washable)		1/2	1/4	1/6	1/7	1/8	1/10	2/-	2/3
			1/3	1/5	1/7	1/9	1/10	2/-	2/3	2/6

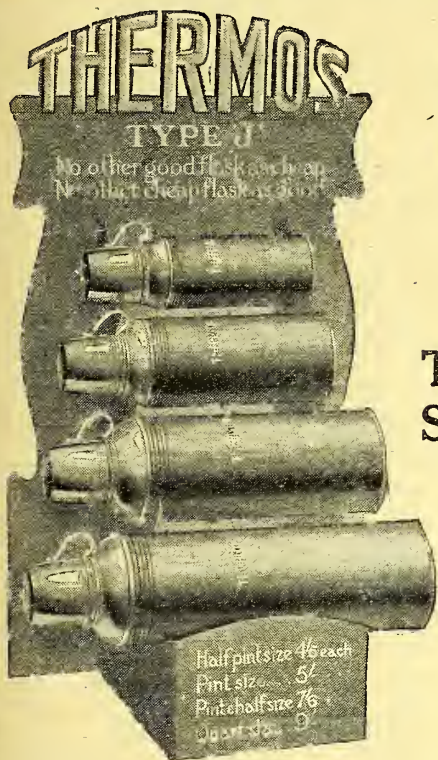
MUFF WARMER, red rubber, oval shape, 3½×7 in., each 2/-

CARRIAGE PAID ON ORDERS OF £3 AND UPWARDS.

A discount of 5% for prompt cash is allowed on all amounts of 10/- and upwards. Money returned if goods are not satisfactory. Write for New Price Lists of Druggists' Sundries, Toilet Requisites, Rubber Goods, Cut Sheet Rubber Appliances, etc.

BURGE, WARREN & RIDGLEY, Ltd.

91 & 92 GREAT SAFFRON HILL,
LONDON, E.C.1.



A NEW "THERMOS" FOR THE POPULAR TRADE

The "J" Series—half-pint to quart—gives you all the selling-points of the higher-priced "Thermos" products, and enables you at the same time to meet the competition of low-priced vessels. It has all the special "Thermos" features, but is less expensively finished.

THIS HANDSOME DISPLAY STAND WILL HELP YOU TO MAKE BIGGER SALES

It is of large size, finished Royal blue with white lettering, and equipped with the four "J" "Thermos" Flasks shown. Let it help to build up more sales for you—we will send it free with your first order for one dozen of each size, or alternatively four dozen "J" type "Thermos" Flasks.

THERMOS LIMITED

12/14 Denman Street, Piccadilly Circus, London, W.
Telephone : Regent 2573. Wires : "Cythermoso, Piccy, London."

**SECURE
SURE
SALES.**



SEASONABLE SELLERS!

OUR NEW ILLUSTRATED LIST OF
WATERPROOF GOODS

SPONGE BAGS, BATHING CAPS,
TOILET HOLDALLS, BEACH BAGS,
IS NOW READY.

SOLPORT BROTHERS, LTD.

Manufacturers,
184 to 190 GOSWELL ROAD, LONDON, E.C.1.
FROM ALL LEADING WHOLESALERS



When going on holidays

impress on your customers
the advantages of taking
with them

NORVIC
(REGD.)

Crêpe Bandages

They prevent as well as
cure varicose veins and
are hygienic and practi-
cally invisible.

*Recommended by doctors
and nurses everywhere.*

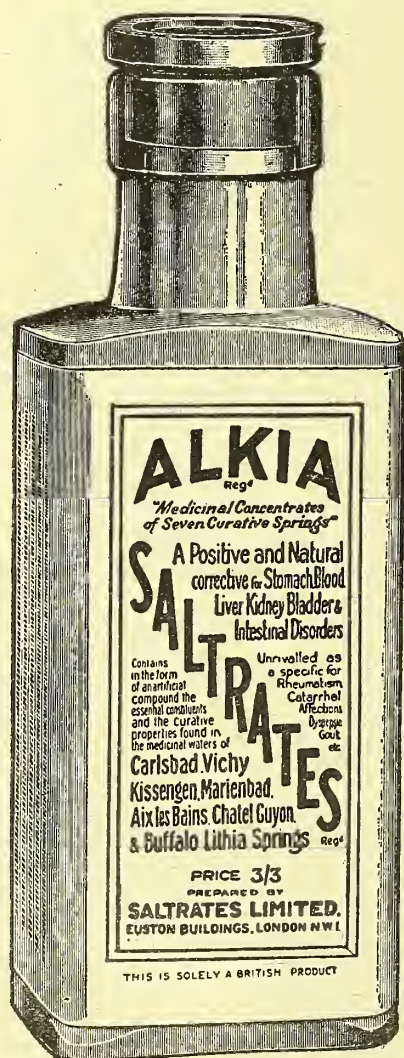
Sole Manufacturers : GROU & CO., Ltd., Great Yarmouth
London Agent - T. S. Eastaway, 35 Wood Street, E.C.2

Two Lines which you, Mr. Chemist

They always mean a pleased and satisfied Customer

With the help of our advertising you have
second and each successive sale is assured

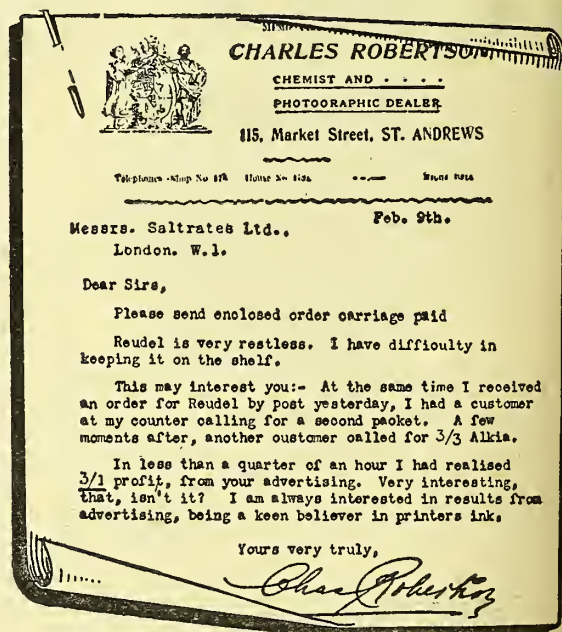
SOME TRULY REMARKABLE



ALKIA SALTRATES.

A widely advertised and quick selling product, which represents the maximum of possible efficiency in a saline, and the best value obtainable for the money. Being highly concentrated, exceptionally small doses are sufficient, and there is no trace of any salty or other unpleasant taste.

Protected on P.A.T.A. at the full face value of 3/3 a large bottle.



WHAT PROMINENT

JIMMY WILDE, World's Champion Boxer:—

"I am glad to testify to the part your Saltrates fulfil during my training periods. I am never without both and never will be."

A. F. (PEGGY) BETTINSON, Founder and Manager, National Sporting Club:—

"I have no hesitation in recommending both Alkia Saltrates and Reudel Bath Saltrates for all disorders arising from uric acid. Personal use satisfies me that no other preparations can equal your product for the elimination of the many ailments for which you advocate their use. You have liberty to use my testimony in any manner desired."

BOMBARDIER BILLY WELLS, the popular boxer

"While a physical instructor in the army I found both Alkia and Reudel to be almost indispensable for correcting and preventing the ill-effects of the pains to which Tommies are subject. Personally I take Alkia regularly and Reudel is always added to my bath."

We have hundreds of similar letters with names of other prominent boxers.

YOU CAN STOCK THESE GOODS

Carriage paid in United Kingdom on orders for 3 dozen, which is sent free on request. Display them in your window, and attract customers.

Recommend with Full Confidence

use they do exactly what our advertisements say.

These products the first time only. The quality of the goods themselves.

TESTIMONY FROM CHEMISTS

W. CORNISH, M.P.S.
THE PEOPLE'S CHEMIST
The Oxford Pharmacy 188 Lower Ashley Rd.
BRISTOL

Messrs. Saltrates Ltd.,
London, W.1.

April 24th.

Dear Sirs:- I was reading through reproduction of Mr Robertson's (St Andrews) letter on page twelve of to-day's date Chemist & Druggist and I think this afternoon I surpassed his feat. In my shop see above. Four customers following, purchasing Saltrates preparations, as follows

2/- Reudel Bath Saltrates	) All in
3/3 Alkia Saltrates	) five
2/- Reudel Bath Saltrates	) minutes
3/3	) or so.

Later on in the day I was asked for another 2/- size Reudel, but in this case the customer would not take the 3/3 size, so I missed the sale, having just sold the last small package. I am quite prepared to admit that this is a coincidence that does not often occur, and probably was in part due to other brother Pharmacists being "Sold out". But your preparations are always good sellers with me.

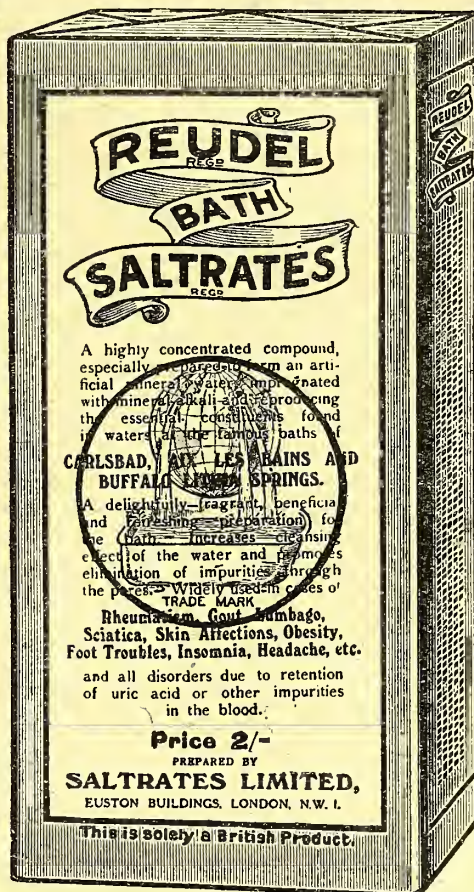
I thought the foregoing would interest you, and it is absolutely authentic, as my Lady Assistant can witness. If the "Tale" wants adorning" and I may "point a moral", I would say never load up your shelves with goods that stick there, but to borrow Mr Robertson's "Natty phrase fill up with "restless" goods, which are restless to the point of removal for "Cash Till Food".

With compliments.

Yours faithfully,

W. Cornish

REUDEL BATH SALTRATES.



A highly concentrated compound, especially prepared from an artificial mineral water, impregnated with mineral salts, producing the essential conditions found in waters of the famous baths of CARLSBAD, AT LES BAINS AND BUFFALO SPRINGS.

A delightfully fragrant, beneficial and refreshing preparation for the bath. Increases cleansing effect of the water and promotes elimination of impurities through the pores. Widely used in cases of

Rheumatism, Gout, Lumbago, Sciatica, Skin Affections, Obesity, Foot Troubles, Insomnia, Headache, etc.

and all disorders due to retention of uric acid or other impurities in the blood.

Price 2/-

PREPARED BY
SALTRATES LIMITED,
EUSTON BUILDINGS, LONDON, N.W. 1.

This is solely a British Product.

ERS SAY :—

GEORGE, World's Champion Runner :—

used Alkia and Reudel with remarkably good results. They are useful products, as everyone to whom I have recommended them sees."

DONALDSON, World's Champion Sprinter :—

has no equal for rheumatic and uric acid disorders of all kinds. Reudel bath will keep the joints more supple than a dozen Turkish tur baths. I could not do without them both."

NE CORRI, of the National Sporting Club and the World's Premier Referee :—

used both of your Saltrates compounds with the best possible results. Alkia is, in my opinion the ideal saline and Reudel could not be used upon."

of space prevents our re-printing here.

GUARANTEED SALE TERMS

orted. Handsome Showcards of strong selling power business from our present extensive advertising campaign.

The most widely advertised and best selling line of its kind. Unequalled as a fragrant, refreshing, beneficial and all-round satisfactory preparation for the bath or for general toilet purposes.

Especially recommended in cases of foot trouble or rheumatic pains, stiffness, etc. Always extensively advertised.

Protected on P.A.T.A. at the full face values of 2/- and 3/3 (double size).

Successful Firms are Always Careful Buyers

BUYING print requires special knowledge and experience.

Many buyers for large firms send us their enquiries for their long-run work. They know that we specialise in long runs. Our machinery is constructed for long runs, letterpress and offset.

Write
Dept. C.

Let us quote you for wrappers and labels.

The Berkshire Printing Co. Ltd.
King's Road, Reading.

Alcohol for Industrial Purposes Duty-Free Spirit.

The Industrial Spirit Supply Company, Limited.

Agents: HONEYWILL BROS., Ltd., 79 MARK LANE, LONDON, E.C.3.

**"DEPENDABLE
TOBACCO
WHOLESALEERS."**

MIXED PARCELS A SPECIALITY.

Established Fifty Years.

Price Lists mailed on request.

A PROFITABLE SIDE LINE
FOR CHEMISTS.

SINGLETON & COLE, LTD., CANNON ST., BIRMINGHAM.

LONDON'S LEADING TOBACCO FACTORS.

New Wholesale and Retail Price List Now Ready.

PROMPT DISPATCH.

SADLER & MOORE

Spital Square, Bishopsgate, London, E.1.

Established over 25 years.

BRITISH OWNED.

SLACK & BROWNLOW,
Town Mills, Tonbridge, Kent.

"Brownlow" Filter
FILTRATION THROUGH CYLINDERS OF KIESELGUHR

Crystal Pure Water.
Free from Disease Germs.



AGENTS WANTED EVERYWHERE.
Catalogue on Application.

Ask for:



Gelatine Works LANGHECK & CO. SSELINGEN

Established 1889

Transparent GELATINE BOXES
colourless or in all colours

POWDERS, TABLETS, PILLS, SALTS, etc.

TRANSPARENT TUBES, SQUARE BOXES, SLIDING BOXES, Window-Boxes, LAYERS printed or plain, Transparent FOILS ex stock LONDON

ASPIRIN
BATH SALT
Acido ACETISALICYLICO

SHAMPOO
BATH CRYSTALS
Orgettes

LARGEST SUPPLIERS to the trade

Transparent Tooth Brush Boxes in all shapes

PHONE: AVENUE 9127

Sole Representatives: JOHN C. NUSSLE & CO. 4, New London Str. LONDON E.C.3

**CHEMISTS
WILL FIND
THIS GOOD STOCK**

Willis's Anti-bacca Herbal

4 oz. 1/- 8 oz. 1/9
1 lb. 3/-

Smoking Mixture

Supplies from Messrs. Butler & Crisp.

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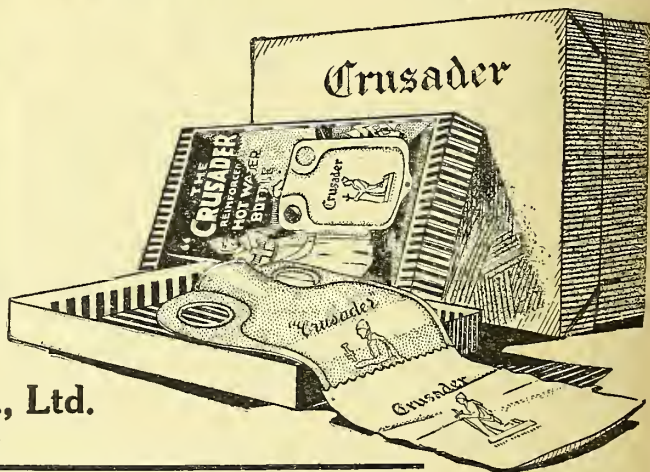
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The Crusader Rubber Co., Ltd.
62 LONDON WALL, LONDON, E.C.

THE CHEMIST AND DRUGGIST SUPPLEMENT

42 CANNON ST.
LONDON E.C. 4

SEPTEMBER 8, 1923

This Supplement is inserted in every copy of The Chemist & Druggist.

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Businesses Wanted and for Disposal, Premises to Let, Goods for Sale, and Agencies—6/- for 50 words; every additional 10 words or less, 6d.

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4.—CRICKLEWOOD (Near).—Modern Pharmacy, capitally situated in busy shopping road; double-fronted shop, corner position; returns upwards of £40 weekly; stock and fixtures estimated by Vendor at £1,400; rent £60; new lease; price £1,600.

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LANCASHIRE.—Good-class Drug Stores for disposal, with nice
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LONDON, S.E.—Old-established Business; unopposed; takings
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LONDON, S.W.—Working-class district; main road; Drug
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SOUTH-WEST COAST.—Mixed Seaside Business; returns
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SHEFFIELD-NEAR.—Light Retail and Photographic Business
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FOR Sale, London suburb, beautifully fitted Shop at present in charge of unqualified person; turnover £1,400; live man could easily double; splendid opening for Optics and Photography; price for quick sale, £1,200. 177/5, Office of this Paper.

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GENUINE Prescribing and Family Retail; densely populated London suburb, well fitted shop, comfortable house, immediate possession; long lease; returns closely approach £2,000, with profits above the average. Price, £1,350, or valuation terms could be arranged. Apply to 179/12, Office of this Paper.

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[HOME.]

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ACCRINGTON, LANCs.—Qualified Assistant wanted at once, lady or gentleman; accurate and quick Dispensing with practical Photographic knowledge essential; salary £4 per week. Full particulars in first letter, please, stating experience, references, and when at liberty. Thornber, Chemist.

BIRMINGHAM.—Permanency for two thoroughly reliable Assistants (Senior and Junior). Must be good Dispensers, live Salesmen, knowledge of Photography and Window-dressing an advantage. Full particulars (qualifications, references, salary (outdoor), etc.) in first letter. Winroope, Market Place, Gt. Bridge, Staffs.

BLACKPOOL.—Qualified Assistant required, age from 25 to 35; must be accurate Dispenser, smart Salesman and Window-dresser; highest references essential. Apply by letter only, stating age, height, salary required (outdoors), and previous experience, to C. R. Gaultier, 41 Devonshire Road, Blackpool.

BOURNEMOUTH.—Required on October 15, qualified Junior Assistant with genuine Dispensing ability and practical experience of Photography (D. & P.); competent Salesman. Full particulars to A. F. Lawrence, Chemist, The Square, Bournemouth.

EASTBOURNE.—Qualified Assistant (male); good-class Dispensing with Counter experience essential. Apply, stating experience, age, height, and salary required, to Senior, Chemist, Eastbourne.

LONDON, N.—A competent male Assistant required, not over 30 years of age, for a middle-class business from September 24. Give full particulars, age, experience, height, and salary, to "Ucal," 178/34, Office of this Paper.

LONDON.—Qualified, experienced Assistant; tactful Salesman, with knowledge of Photography. W. Shadforth, Ph.C., 49 King William Street, E.C.4.

LONDON, Central; outdoors; no Sunday or Bank Holiday duty. Junior wanted at once, not over 25, with good Retail experience, including Photographic trade. Crowe & Co., 31 Wardour Street, W.1.

LONDON, S.—Fully-qualified lady or gentleman, single; must be quick at sales, accustomed to smart dressing-out and N.H.I.; good stock-keeper. Apply fullest particulars, experience, age, salary, to "C. N.," 180/8, Office of this Paper.

LONDON, W.1.—Wanted, early in October, qualified Assistant, permanent, for high-class Dispensing business; no Insurance or Photographic; must be an accurate Dispenser and of gentlemanly appearance; also an energetic Improver at once. Apply, stating experience, age, salary required (outdoors) 180/23, Office of this Paper.

MANCHESTER.—Qualified Manager wanted for high-class Dispensing business in residential district; must have had experience, be good Salesman, and capable of taking full control. Write, stating age, whether married or single, salary required and particulars of experience, to Thos. Tomlinson & Son, Chemists' Valuer, 45a Market Street, Manchester.

PORTH, GLAM.—An unqualified, unmarried male Assistant, outdoors; no Sunday duty; reasonable hours. State age, experience, salary required, and when disengaged. T. Davies, Chemist, Porth, Glam.

SOUTH DEVON.—Junior, unqualified Assistant (male); good Counterman, capable Dispenser; knowledge of Photography an advantage. Full particulars and references, with salary required (outdoors), to 177/35, Office of this Paper.

SOUTH WALES.—Junior, for Cash Retail; knowledge of Photography preferred. Write Blatt, Chemist, 3 Briton Ferry Road, Neath.

ST. AUSTELL, CORNWALL.—Wanted, at once, a qualified Assistant, young man or lady. Apply, giving full particulars, salary required, to P. G. Michell, 35 Fore Street, St. Austell.

STAFFORD.—Qualified Assistant (male) wanted; must be a quick and accurate Dispenser. Give particulars of experience, state age and salary required. J. & H. A. Averill, Chemists, Stafford.

SURREY.—Capable Assistant, age about 26-28; high-class Dispensing; outdoor. Full particulars of experience, whether qualified, salary, etc., to W. N. Ashworth, Weybridge.

A CAPABLE Junior (at once) for good-class Dispensing business. Full particulars to Gregory, Chemist, Huyton, nr. Liverpool.

ASSISTANT with experience of high-class Family Dispensing business, male, about 25 years of age; smart appearance essential. Apply, with salary and references, Richards, Hagley Road, Birmingham.

ASSISTANT (unqualified).—Messrs. Holman, Ham & Co., Ltd., have a vacancy for a Junior Assistant or Improver end of September for good-class country business (Retail); knowledge of Photography preferred, but not essential. Apply (in first instance) with fullest particulars to St. Anne's Pharmacy, Sidwell Street, Exeter.

ASSISTANT wanted for a S.W. London branch, about 30; must be experienced, capable, good Window-dresser and expert Salesman, and know up-to-date methods. Apply, with fullest particulars, stating salary required, to Lion Drug Stores, Ltd., Head Office, 75 West Street, Brighton.

ASSISTANT (male), unqualified, or lady (Hafl) with good Counter experience. Clarke, 145 Stanstead Road, S.E.25.

CAPABLE qualified Assistant, young, required immediately to manage small Branch Business, Midlands; must be accurate Dispenser, good Counterman. Reply, stating age, salary required, experience and references, to 180/13, Office of this Paper.

COMPETENT Manager required; must be energetic; permanency to right man. Apply, stating when disengaged and usual particulars, with photograph, to 31/991, Office of this Paper.

FLUENT French and good Foreign experience required in a qualified manager; salary and an increasing commission. Apply, stating experience and references, to The Pharmacie Centrale, Ltd., 34 Leicester Square, W.C.2.

FOR October 1, a reliable Assistant; outdoors; good-class Family and Photography; easy hours; no duty; permanency for suitable man. Letters not answered in three days declined with thanks. Full particulars to Bernard W. Leye, Pharmacist, Pinner, near Harrow.

JUNIOR Assistant wanted; must be good Window-dresser and well up in Photography; also smart Counterman; this is a permanency to an obliging man; references and salary. Apply Bakers', Limited, the Up-to-date Pharmacy, 9 Midland Street, Hull. Telephone: 197y.

LOCUM.—Qualified lady or gentleman required immediately for three or four weeks; good references essential. Apply personally, if possible, to A. Catto, Messrs. Catto, Ltd., 49 Cranbrook Road, Ilford.

MANAGING Assistant required in a good-class Country Business; some knowledge of Agricultural Trade desirable; a comfortable berth and reasonable salary is offered to a suitable applicant. Apply, with full particulars, A. Roberts & Co., Chemists, Campden, Gloucester.

B. SEERS, Chemist, Llanelly, S. Wales, requires competent, unqualified Assistant at once; Dispensing and knowledge of Photography. Full particulars in first letter as to experience, references and salary required.

QUALIFIED Assistant (outdoor); energetic, trustworthy; good Salesman and Window Dresser, with knowledge of Photography. State age, height, experience, salary required, references, and when disengaged. Thursday half-holiday; no Sunday duty. Applications (by letter only), stating age, height, experience, reference, salary required, and when disengaged. L. J. Leade, Pharmaceutical Chemist, 17 Lichfield Street, Wolverhampton.

QUALIFIED Assistant wanted (male) for high-class Dispensing Business. State salary required (outdoors), and usual particulars, enclose photograph, to H. R. Browne, 1 Cornfield Road, Eastbourne.

SMART, up-to-date Junior or Assistant, neat and accurate Dispenser; experienced and reliable. All not answered three days respectfully declined. Venables, Chemist, 211 King Street, Lammersmith.

UNQUALIFIED Junior wanted soon for N.H.I., Photo and Counter; must be quick and obliging. Pinson, 15 Amhurst Road, Stamford Hill.

WANTED, immediately, man Dispenser; Hall qualifications. Apply Drs. Power & Burton, 9 London Road, Spalding.

WANTED, Assistant, qualified, male; accustomed to good-class Retail and Dispensing business; for period of about 4 weeks, commencing September 17. Particulars to Scott, Pharmaceutical Chemist, Ilfracombe.

WANTED, qualified Assistant to manage branch; Optical and Photographic knowledge essential. Replies to Chemist, 12 High Cliff, Cleethorpes.

WOMAN, accustomed to putting up Chemist's stock. Apply, giving full particulars, to "A. J. B. C." Cooper, Son & Co., Ltd., 80 Gloucester Road, South Kensington, S.W.7.

YOUNG, unqualified Assistant for good-class Dispensing business, September 24. Apply, stating age and salary required, Jeffries, 23 High Street, Guildford.

WHOLESALE.

5. for 40 words or less; 6d. for every additional 10 words or less, prepaid.

ADVERTISER may if preferred have replies addressed to this Office, and forwarded on payment of an additional charge of 1/-.

MAGNIFICENT opportunity occurs for experienced Chemist, not necessarily qualified, to join small but progressive Wholesale Business handling a number of successful good selling lines; applicants must be prepared to take up substantial interest and energetically devote whole time to company's service, travelling or inside duties. Full references, personal and financial, with communication, in confidence, to "Secretary, Limited," 77/38, Office of this Paper.

COMPETITIVE high-class line of Soaps and Toilet Articles by old-established Continental firm.—Representative required in London to call on large Stores and Wholesale Houses only; commission basis 10% an exceptional opportunity for a man with sound connection, who can carry a few additional lines. Apply "Caba," 31/982, Office of this Paper.

EXCELLENT opening for Traveller, whole-time, with well-known Proprietary House; must be able to drive car, and have sound connection amongst Chemists in Lancashire, Yorkshire, and Northern Counties. State experience, age, salary required. P.C.B. 69/11, Office of this Paper.

GOOD-CLASS Perfumery and Toilet Soaps.—Representatives required throughout the United Kingdom on a commission basis; those who have a good connection amongst Chemists for a non-competitive line only considered. Address, in strict confidence, 31/985, Office of this Paper.

PROPAGANDA Representatives required with Pharmaceutical or Medical knowledge, to call on Medical Profession with high-class Proprietary Article. Write, with full particulars, to P.C.B. 69/26, Office of this Paper.

REPRESENTATIVE, already calling on Chemists, urgently required for Northants, Beds., Herts, and part of Essex to sell Malt Products on commission. 31/988, Office of this Paper.

REPRESENTATIVE, already calling on Chemists, urgently required for Berks, Bucks, and Oxon to sell Malt Products on commission. 31/987, Office of this Paper.

REPRESENTATIVE calling on Chemists throughout Lancashire and carrying one or two other lines, wanted by Proprietary firm; please state commissions at present held, and whether the above territory is worked by car. 174/40, Office of this Paper.

REPRESENTATIVES wanted by important Agency House to develop established connections in Brushware, Soap, etc. Write, in confidence, stating experience and territory previously worked. Salary, commission, and excellent prospects. 31/984, Office of this Paper.

REPRESENTATIVES wanted by well-known Pharmaceutical and Photographic Chemical House for certain parts of England and Wales; must have well-established connections amongst the Retail trade; applications from men who wish to add a good commission; good man could average £10 per week. Reply, in confidence, with full particulars of ground covered, etc., to 31/980, Office of this Paper.

REPRESENTATIVE wanted for Wholesale Druggists, to call on Chemists in Birmingham and district; must have had good experience in trade and preferably holding connection; state full particulars and salary required by letter only. Charles C. Williams, Ltd., 64-68 Summer Row, Birmingham.

REPRESENTATIVES WANTED.—Lady or gentleman required to introduce established proprietary preparation; those calling on the Medical Profession and with Pharmaceutical knowledge preferred; state in first instance ground covered. Apply, "Commission," 30/969, Office of this Paper.

REPRESENTATIVES required, with connection among Chemists, etc., for sale of well-advertised Proprietary Lines on commission basis. Applications will only be considered from five salesmen and who already represent an established house. Write, stating fullest particulars of exact territory covered, lines carried, etc., in confidence, to Robert W. Phillips, Ltd., Craven House, Kingsway, London, W.C.2.

REPRESENTATIVE wanted by London House Chemists' and Hairdressers' Sundries; good connection; commission basis; Derbyshire, Nottingham, Leicester, Warwick, Northampton, South Lincs.; applications preferred from men working the ground now who would like to add second commission; liberal commission paid. Write full details, P.C.B. 69/37, Office of this Paper.

SALESMAN required to handle Proprietary Lines and Chemists' Packed Lines; Northern Counties; must live in territory. Send full particulars of experience and salary required to P.C.B. 66/23, Office of this Paper.

TABLETS.—Young, capable man wanted immediately for Compressed Tablet Making (plain, sugar and chocolate coated); able to devise his own formulæ; applicant must be willing to assist in Pharmaceutical Laboratory in spare time. Give full particulars, stating wage required, in first letter to Goodall, Backhouse & Co., Leeds.

THOROUGHLY competent Export Invoice and Shipping Clerk wanted by firm of London Druggists; age about 35; must have full acquaintance with South American trade, know Portuguese and Spanish well, be quite familiar with prices, and be competent to deal with all matters relating to Consular certificates, clearance, etc. State experience and salary required to 31/989, Office of this Paper.

TRAVELLING Representative for London Area.—Progressive, old-established firm requires an energetic man with good connection amongst Perfumers, Chemists, high-class Drapers, and Foreign Fancy Departments of Stores, able to influence good business in a large range of Toilet Accessories; good commission and small salary; no objection to representative carrying another line for reputable firm which does not clash. State full particulars, in confidence, to 31/986, Office of this Paper.

TRAVELLER required, accustomed to calling on Chemists, Welfare Clinics, Hospitals, etc. State experience and salary required. 31/983, Office of this Paper.

TRAVELLER required to introduce Patent Medicine amongst Chemists in London and provinces; could be taken as a side line. Apply 31/978, Office of this Paper.

TRAVELLER for visiting the Medical Profession, London and suburbs, and one for visiting the country. 31/979, Office of this Paper.

WILKINSON & SIMPSON, LTD., Wholesale Druggists, New-castle-upon-Tyne, have a vacancy in their Laboratory for an Assistant (Major qualification); also require the services of a Traveller, qualified, calling upon Chemists and Doctors in Northumberland and Durham. Applications, giving full particulars, age, experience, etc., as above.

[COLONIAL, INDIAN AND FOREIGN.]

BRITISH COLONY.—Wanted by an English firm of Chemists, an Assistant with the qualification of the Pharmaceutical Society of Great Britain; salary £350 a year, quarters, and servant allowance; two years' engagement; first-class passage out and home; applicants must not be over thirty years of age, unmarried, and of good address; preference given to one with a knowledge of Optical work. Apply 179/11, Office of this Paper.

FLORENCE, ITALY.—Wanted, smart Assistant of good appearance and address, chiefly for Counter work; knowledge of French or Italian preferred. Send full particulars in first letter to "A. H. M.," c/o Allen & Hanburys, Bethnal Green, E.

LAUSANNE, Lake of Geneva, Switzerland. — Wanted for October 1 or a little later, qualified Assistant, with good knowledge of French and Continental Dispensing; smart Counter-man; not over 40; permanency; outdoors. Apply with full particulars, photo if possible (to be returned), and salary expected, to Dersiph & Co., Pharmacie Internationale, Lausanne.

MALAY STATES.—Junior Assistant, Minor qualification, single, age about 25, for Malay States, required immediately; three years' agreement; salary \$500 (£35) per mensem for the first year, \$325 (£37 18s. 4d.) per mensem for second year, \$350 (£40 16s. 8d.) per mensem for third year, with second class passage out and home on agreement expiring; excellent prospects for right man; details re climate, living, etc., supplied on interview. Apply, by letter only, with copies of references (not returnable), to Dakin Bros., Ltd., 82 Middlesex Street, London, E.1.

MONTE CARLO.—Assistants, English or foreign, speaking English and French and knowing English Pharmacy, required for the Winter Season at Monte Carlo on the following terms:—

From November 16 to about April 15.

600 fr. per month if without diploma, 650 fr. per month with diploma, foreign students speaking English and English students speaking French.

A percentage on house specialities and accessories.

250 fr. for travelling expenses.

One day's holiday per week.

Hours from 8.30 to 8, with 1½ hours for mid-day meal.

Write, enclosing references and photograph, to M. le Secrétaire de la Société des Pharmaciens de la Principauté de Monaco et Beausoleil, Villa Said, Monte Carlo.

We desire particularly to draw the attention of Colonial and Foreign Subscribers to the fact that in cases where they require partners, agents or assistants, or wish to sell their businesses, an Advertisement in this Supplement, placed in every copy of "The Chemist and Druggist," should be the readiest means of helping them to attain their object. The tariff for such announcements is given under the appropriate headings in the Supplement. Instructions and remittances can be sent to us direct or through the advertisers' correspondents in this country.

Returning Photos, &c.

Advertisers in this section who receive portraits and copies of testimonials from applicants, with a stamped addressed envelope for reply, are reminded that the undue retention of these often means a hardship to the sender. All personal documents should be returned as promptly as possible after perusal.

NAMES AND ADDRESSES.

When sending advertisements for any of the sections in this Supplement, advertisers—as a guarantee of good faith and not necessarily for publication—should always give their names and addresses. It sometimes occurs that this rule is not followed and delay and disappointment ensues. Strict attention to this detail will be appreciated.

SITUATIONS WANTED.

RETAIL.

[HOME.]

2s. for 18 words or less; 6d. for every additional 10 words or less, prepaid.

The ADVERTISER may if preferred have replies addressed to the Office, and forwarded on payment of an additional charge of 1/

LONDON District.—Dispenser (Hall) requires post, Doctor, Chemist, or Institution; 7 years' experience. 172/3, Office of this Paper.

NOTTINGHAM.—Qualified, abstainer, single, 24, requires permanent situation; all-round experience; Photograph 179/19, Office of this Paper.

MIDLANDS.—Qualified, 25, desires change; 3 years' experience as Manager in industrial town; excellent reference "Sinapis," 176/9, Office of this Paper.

A.A.—COMPETENT Junior, 21; tall; first-class experience Dispensing, Counter, and Photography (unqualified excellent ref.; London preferred, but not essential. Price, "Fairholme," Hewlett Street, Cheltenham Spa.

A.A.—Part or full-time, London, required by unqualified (22); seven years' experience Dispensing and Counting qualified Optician (D.B.O.A.). "Radix," 16 Sussex Road Sidcup.

A PHARMACEUTICAL Chemist, young, energetic, desires Managership or responsible position in Scotland; Lothian preferred, but not essential; good general and Photography experience; good references; disengaged shortly. Apply with terms to 177/7, Office of this Paper.

A PHARMACIST, 28, nine years' Retail experience, last 5 years Hospital Pharmacist, desires post in Retail; sound genuine services; ability; Salesmanship; excellent reference. Full particulars, please, salary offered. 180/34, Office of this Paper.

A QUALIFIED gentleman, with 20 years' first-class, a round expert experience in all departments, is open, at the end of September, to undertake management, with view to succession. Write "Pharmacist," 24 Minerva Street, Bulwer Notts.

A QUALIFIED man, 34, single, competent, abstainer, seeks berth as Branch Manager, etc.; recommended; moderate terms accepted, but mention offer to save time. 179/24, Office of this Paper.

A PERMANENCY required three weeks' time; married; age 30; accurate Dispenser, good Salesman; unqualified; West End City, or local; undeniable references. Sims, 14 Hyt Road, Thornton Heath.

A ACTIVE, energetic, obliging, experienced, unqualified Assistant, age 28, desires permanency early October; afraid of work; London or South-East Counties preferred; essential; first-class references. 178/39, Office of this Paper.

A S Manager; 30; qualified; Lancashire or Yorkshire preferred; good references and experience; Photography, etc. 177/7, Office of this Paper.

A S Locum or Manager; now disengaged; qualified; long experience all branches. "Pharmacist," 71 Trafalgar Road Wallasey.

A S Locum, Branch, Senior; 30 years' record experience 6 years' management; highest credentials; sick relief and Enfield; lowest terms. "Fairley," Knight Hepburn, Pharmac

A S Assistant; unqualified; age 21; height 6 ft.; one year Dispensing, Counter work, with well-known firm; excellent reference. Apply, "Sapo," c/o McCulloch, Beresford Terrace, Ayr, Scotland.

S Junior; good references, aged 20, desires position in London; City preferred. Apply, "Montview," Baker's Hill, Coleford, Glos.

ASSISTANT; unqualified; 35; good Dispenser; 18 years' experience; disengaged three or four weeks; start at once. P. R. N., 178/17, Office of this Paper.

ASSISTANT; brisk Counter trade, light Dispensing, Windows, Stock; 45s., provinces; satisfactory references; excellent general experience. "Provinces," 177/29, Office of this Paper.

ASSISTANT or Locum; disengaged September 15. "Aspirin," 2 High Street, Gillingham, Kent.

ASSISTANT; 5 ft. 10 in.; age 38 years; thoroughly London experienced; energetic Salesman; excellent references; unqualified. "Statim," 6 Oslade Road, Brixton.

ASSISTANT, unqualified, Stock, Counter, Prescribing, Dispensing, requires permanency. "Statim," 151 Hamlet Court Road, Westcliff-on-Sea.

ASSISTANT, gentlemanly; unqualified; 16 years' varied experience; capable Counterman, Dispenser; working knowledge Photography; willing worker; accustomed management; Locum or permanency; liberty September 15th. "Energy," 209 Ford Lane, E.

ASSISTANT; unqualified; excellent all-round experience; not afraid of work; Manchester and district; disengaged September 15. "Statim," 5 Harrison Street, Gee Cross, Hyde. Will advertiser please send name to this Office?

BOOK-KEEPING and Clerical Work; day or evenings. Apply "X. Y. Z.," 152/22, Office of this Paper.

CHEMIST'S Assistant; unqualified; middle age; good Prescriber, Counterman and Dispensing; very active; excellent references; could invest £100; Manchester district preferred; disengaged end of October. "Rhei," 178/14, Office of this Paper.

DISENGAGED.—Assistant, good class; experience Dispensing, Counter, Window-dressing, Photography. Shiels, 28 Newington Butts, S.E.

DISENGAGED September 18th, for Locum or permanency; Minor man; moderate terms; varied experience. "Pharmacist," 4 Sydney Road, Ealing, W.13.

DISPENSER, Major qualification; disengaged September 8; Pharmacy Surgery, N.H.I. or Cover; part time entertained. N.H.I., 115 Loampit Vale, Lewisham, S.E.13.

DISPENSER and Book-keeper, 40, requires permanency or Locum; 20 years' experience; good references. Strutt, 2 London Road, Hailsham.

GENTLEMAN, 35, requires evening situation (including all day Saturday) early October; 15 years' West-End experience; sharp Dispenser and Counterman; any capacity. "Alpha," Galton Street, Queen's Park, N.W.6.

IMPROVER; Pharmacist-Optician, careful and accurate Dispenser, passed Part 1 F.S.M.C., requires experience in Dispensing and Sight Testing; age 19½; height 6 ft. A. V. Corden, L. N. Corden, Chemist, Pulborough.

JUNIOR, age 20; tall; 6 years' all-round experience; good references. Hughes, c/o H. A. Blades, M.P.S., Pharmacist, andudno.

JUNIOR, 21, well recommended, requires situation September; five years' experience in Dispensing, Counter, and Photographic work; town or country; highest references. Apply, Rowe, 28 Mons Way, Bromley, Kent.

ADY Assistant (Hall Certificate), just finishing second season in busy N. Wales resort, desires post (in Lancashire preferred) about middle October; good all-round experience. 178/3, Office of this Paper.

ADY Dispenser and Book-keeper, experienced, Hall certificate, requires post with Doctor. Apply Miss Goodall, Warren-st, Twyford, Berks.

ADY Dispenser, Hall, requires post in or near Hull; whole or part time. D. Bygate, 119 Boulevard, Hull.

ADY, Minor, desires post; 7 years' experience, Dispensing, Counter; Bath, Bristol, or Cardiff preferred. Brewer, 4 Tregon, Bath.

ADY, 22, recently qualified, requires position, Retail or Institution; experience in Dispensing, Counter and Photography. "H.," Stanrose House, Egerton, near Bolton.

ADY Dispenser (Hall) desires post with Chemist or Doctor; experience with both. Apply 179/26, Office of this Paper.

LOCUM or otherwise; qualified; good all-round experience and references. "Delta," 18 Bickley Street, Tooting, S.W.17.

LOCUM or permanency; Minor; London or country; disengaged September 8; good references; elderly. P. Smith, 127 pel Road, Forest Gate, E.7.

LOCUM or permanency; 35; Dispensing, Counter, Stock, Prescribing and Photography; trustworthy. "H.," c/o Davies, Brixton Road, S.W.9.

LOCUM, 50; qualified; disengaged from 17th inst.; excellent references; experienced. "Pharmacist," 3 Rectory Road, Stoke Newington, N.

LOCUM; qualified; disengaged September 17; best references; good work; moderate salary. "Chemist," c/o Mr. Derbyshire, Malvern Link.

LOCUM, 45; disengaged September 12; abstainer; all branches; sold own business; any district. "Ral," 180/27, Office of this Paper.

LOCUM or Manager, with or without view to purchase; good business man; town or country; Registered Dentist. "Val," 180/7, Office of this Paper.

MANAGER, qualified, 28, married, desires engagement; permanency; London or South; experienced and energetic; 3 years present situation; used Window-dressing and busy Retail; excellent references. 177/30, Office of this Paper.

MANAGER, 29, qualified, desires change; highest references; excellent experience in all branches. Apply 179/33, Office of this Paper.

M.P.S., YOUNG, desires permanency as Manager or Dispensing Photography, etc. "Scotsman" (P.C.B. 69/23), Office of this Paper.

M.P.S. (LADY, 21) desires post; no experience; all-round experience in good business desired; salary no object; Square training; S.W. district preferred. "T. H.," 7, Sumburgh Road, S.W.12.

M.P.S., 23, wishing to study Optics, would like situation could be gained; North Midlands preferred; beginning of October; good Dispenser and Salesman. "Chemist," c/o Mrs. Bonnin, 71 St. George's Square, S.W.1.

PART-TIME.—Student; 7 years' Dispensing and Retail experience; capable; London district. "S.," 19 Borough Hill, Croydon.

PART Time; student requires situation; Counter or Dispensing; evenings; excellent references; commence September 24th; S.W. if possible. H. W. Hockney, 24 Donington Street, Grimsby.

PART Time; good Counterman; quick and accurate Dispenser; all-round experience; excellent references. "Chemist," 16 Dundalk Road, S.E.4.

PHARMACIST, woman; disengaged; Institution, Doctor or Retail; good experience and excellent testimonials; also a knowledge of Bacteriology; capable. 178/11, Office of this Paper.

QUALIFIED desires permanency; age 27; 5 ft. 7 in. height; West-End and provincial experience. Hubbard, 1 Sea Road, Highcliffe, Hants.

QUALIFIED man requires post; single; age 23; disengaged; London preferred. 177/26, Office of this Paper.

QUALIFIED.—Manager, London only, or Locum; disengaged September 15; thoroughly experienced. "Chemist," 44 Devonshire Road, W.4.

QUALIFIED, 28, with 7½ years' experience in Dispensing, Retail and Photographics, seeks position in good-class Pharmacy from middle of October; London district or near preferred. 178/37, Office of this Paper.

QUALIFIED; elderly; Hospital or Institution; 11 years' Hospital experience. "Chelsea," 22 Bramerton Street, Chelsea, S.W.3.

QUALIFIED, 22; 7 years' country and town (including London) experience; Locum or permanency; permanency preferred; disengaged September 24. Shelton, Holmbury Villa, Vincent Lane, Dorking.

QUALIFIED; middle-aged; reliable worker; abstainer; London preferred; disengaged. Ellinor, 77 Atlantic Road, Brixton, S.W.9.

QUALIFIED Chemist, 25 years' experience, seeks post as Manager or other responsible position; moderate salary; first-class references. "International," 4 Ormond Terrace, Cheltenham.

QUALIFIED, 41, good experience as Manager, offers services with view succession; country preferred. Replies 180/200, Office of this Paper.

UNQUALIFIED, age 38; tall, courteous (married); specialist Surgical Fitting and Salesmanship; Dispenser-Prescriber; keen and adaptable; progressive permanency essential; employed; interview (London, W.); references first class; strict and mutual confidence. "Sheldon," Office of this Paper.

UNQUALIFIED, 23, tall, good education, seeks Locum or post till Christmas; Private and N.H.I. Dispensing, Counter, Window-dressing. 177/8, Office of this Paper.

UNQUALIFIED, 26, experienced Dispensing, Photography, Window-dressing, Counter, etc., desires post shortly; very good references. Write 178/7, Office of this Paper.

UNQUALIFIED, 24; permanent, temporary, or part-time berth in London; any capacity; 5 years' experience, Dispensing, Counter and Window-dressing. "R.," 121 New King's Road, S.W.6.

UNQUALIFIED; 36; single; best West-End experience; locum or permanency. Little, 9 Westbourne Street, Chelsea, S.W.3.

WANTED to place a young lady of 17 as Apprentice in a good business within 50 miles of London; passed Prelim. Froome, 51 Chester Terrace, S.W.1.

YOUNG Lady Assistant requires situation, Liverpool or district; unqualified; high-class Dispensing experience. Bentley, 27 Surrey Street, Norwich.

YOUTH, age 17, tall, smart appearance; secondary education, seeks berth as Apprentice in good-class Chemist's business in or near London. Full particulars to "J. F. S.," 31 Lockwood Road, Ilford.

WHOLESALE.

2s. for 18 words or less; 6d. for every additional 10 words or less, prepaid.

A **KEEN**, smart man (30), with good experience Retail, Wholesale, Works, Pharmaceuticals, Beverages, Toilets, etc.; control, systemise; any capacity, Retail, Works or Office. "Normanhurst," Heston Road, Hounslow, Middlesex.

A **TRAVELLER** (Crude Drugs, Ireland only) would carry Tablets or compact samples. "Sales," 177/12, Office of this Paper.

A **DVERTISER**, age 42, desires position as Manufacturer; 20 years' experience in Toilet Preparations, etc. "P.," 1 Gillingham Street, Victoria.

A **NALYTICAL** Chemist, 35; single; 4 years' war service; educated Public School; B.A., Inter. B.Sc. Engr. and Chemistry; some experience as Chemist and Assistant Manager, Paper Mills; thorough knowledge of Analytical Chemistry; willing to take any post. M.L. 1606/23, Office of this Paper.

C **HARGE** Hand, Tablet Maker; 18 years' experience; also Sugar Coating, etc. A Goldstone, 11 Hillery Road, Watworth, S.E.

E **X-OFFICER**, 34, desires post as Business Manager, Organiser, Representative, Salesman, Interviewer or General Secretary; thorough knowledge of Chemistry, Photographic Equipment, Surgical Goods, etc.; is willing to take any post. M.L. 19083, Office of this Paper.

E **XPERIENCED** Salesman and Propagandist for Pharmaceutical Specialities, specially well introduced in Switzerland, Austria, Germany, France, Belgium, speaking five languages, single, desires re-engagement in well-established firm; excellent references as to character, etc. Theo. G. Gloor, at the Pharmacy Bouchery, Ostend, Belgium.

G **ENTLEMAN** desires situation as Assistant Buyer or Assistant Manager in Druggists' Sundries House; first-class knowledge all sources of supply, costing, stock-keeping, and all essentials in the trade. 175/7, Office of this Paper.

G **ENT**, 45, with good connection among Hospitals, is open to represent actual manufacturers of Surgical Dressings able to quote keen prices for large contracts. "E. A. W.," 25 Park Lane, Wallington.

L **ABORATORY**; 20 years' experience; good knowledge of Toilet Galenicals, and general Laboratory work; can take charge if required. P.C.B. 67/8, Office of this Paper.

Q **UALIFIED** Chemist desires berth as Commercial Traveller; splendid connection London and the North of England. "Ability," 176/29, Office of this Paper.

R **EPRESENTATIVE**, experienced in Hairdressers and Chemists' Sundries, Drugs; sound connection; interview. P.C.B. 68/17, Office of this Paper.

T **ECHNICAL** and Research Chemist, 33; married; 5 years' war service; educated Public School and Technical College; Diplomas; has held post as Chief Assistant to leading Consulting Chemist five years; extensive experience Laboratories; specialises Acids, Oils, Sugar, Metallurgy; good organiser; willing to take any post. M.L. 1469/23, Office of this Paper.

W **ORKS** or Department Manager, Toilet and Pharmaceutical Preparations and Specialities, Soap, Perfumes, Chemicals and Polishes, 27 years' unique experience, English and American, open for reasonable proposition from reputable concern, preferably Toilets; London or suburbs only. P.C.B. 69/21, Office of this Paper.

[COLONIAL, INDIAN AND FOREIGN.]

M.P.S., **YOUNG**, energetic, adaptable; 9 years' all-round experience, Retail, Dispensing, Salesmanship. Window-dressing, Photographic Specialist, at present managing, desires progressive situation abroad. Apply 177/34, Office of this Paper.

Q **UALIFIED** Chemist, with 15 years' experience of the Drug trade in all its branches, desires position of responsibility in the East in good-class Pharmacy, has had war service in Persia, India, and East Africa; on Assistant Surgeon's duties in Persia. 180/5, Office of this Paper.

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